



CRITTALL
METAL WINDOWS

**PRODUCTS
OF
CRITTALL**



UNIVERSAL CASEMENTS

Custom-built casements and doors of solid steel or bronze to meet the architects' sizes, designs, and most exacting specifications.



NORMAN CASEMENTS

Economical, heavy, standardized casements and doors of excellent quality for better class projects.



STANWIN CASEMENTS

Standard lightweight casements and doors stocked in warehouses for convenient distribution.

Cover Design: Caddo Parish Courthouse, Shreveport, La.

E. F. Neild, Architect

A UNIVERSAL CASEMENT INSTALLATION

CRITTALL METAL WINDOWS

of Solid Steel, Bronze and Aluminum



CRITTALL CASEMENT WINDOW COMPANY

Member Solid Section Steel Window Industry

MAIN OFFICE AND FACTORY
DETROIT, MICHIGAN

ATLANTA OFFICE.....723 Forsyth Building
CHICAGO OFFICE.....228 North LaSalle Street
DALLAS OFFICE.....621 Construction Building
LOS ANGELES OFFICE.....504 Union Insurance Building
MT. VERNON, N. Y. OFFICE.....341 North High Street
NEW YORK OFFICE.....101 Park Avenue
WASHINGTON, D. C. OFFICE.....1224 Twenty-fourth St., N. W.

REPRESENTATIVES IN ALL PRINCIPAL CITIES. WAREHOUSES AT CENTRAL
DISTRIBUTING POINTS



THIS COMPLETE CATALOGUE IS IN SWEET'S 1932 EDITION

OVERSEAS ORGANIZATIONS

ENGLAND

The Crittall Manufacturing Co., Ltd., 210 High Holborn, London, W. C. 1. Factories at Braintree, Witham, Maldon, and Silver End, Essex.

GERMANY

Fenestra-Crittall, A. G., Rather-Strasse 243-61 Postfach 10031, Dusseldorf-Derendorf. Factory at Dusseldorf.

AUSTRALIA

The Crittall Manufacturing Co. Pty. Ltd., 668 Bourke St., Melbourne. Factory at Melbourne.

INDIA

The Crittall Manufacturing Co., Ltd., 918 Currimbhoy Rd., Bombay. Branches at Calcutta, Rangoon, Madras, and Karachi.

NEW ZEALAND

The Crittall Manufacturing Co., Ltd., Auckland.

SOUTH AFRICA

The Crittall Manufacturing Co., Ltd., Union House, Main Street, Johannesburg. Branches at Capetown, Durban, and Port Elizabeth.

CHINA

The Crittall Manufacturing Co. (China), Ltd., 138-142 Sassoon House, Shanghai. Branches at Hong Kong, Tientsin, and Hankow.

INDEX

Our Guarantee and Standards of Material and Workmanship on Page. 3

UNIVERSAL CASEMENTS

Of Steel, Bronze and Aluminum*

Custom built for the finest work	PAGE
Description, Specifications and Table of Maximum Sizes	5
Hardware, Standard	6, 7, 8
Hardware, Special	9
Hardware, Casement Door	28
Mechanical Operating Devices . .	30
Bronze Casements	31

Scale Details

Full Size Sections 10, 11, 12, 13, 14	
Out-Opening Casements	18, 19, 24, 27
In-Opening Casements	20, 21, 24
Pivoted Casements	22, 23
Projected Casements	24, 26
Stationary Sash	19, 20, 23, 24
Operating Room Windows	25
Reversible Windows	26
Office Building Windows	26, 27
Doors	29
Pressed Metal Sub-frames	15, 16, 17, 18, 19, 24, 26
Angle Fins	14, 21, 23, 27
Glazing Direct in Stone	23
Double Glazing	23
Steel Stools	27

NORMAN CASEMENTS

Heavy standard windows for the best type of work

Description and Specifications	33
Hardware	34
Types and Sizes	35
Screened Casement	42
Door	43

Scale Details

Full Size Sections	36, 37
Out-Opening Casements . . .	38, 40
In-Opening Casements	39, 41
Stationary Sash	38, 39
Door	43
Angle Fin	36, 38, 39
Sub-frames	41

STANWIN CASEMENTS

Standard Light Weight Casements

Descriptions and Specifications	45
Hardware	46
Types and Sizes	47
Screened Casement	52
Door	43

Scale Details

Full Size Sections	48, 49
Installation Details	50
Wood Surround, full size details of	51
Door	43

*Our decision to manufacture aluminum windows was not reached in time that we could include details and specifications in this catalogue. However, we are confident that at the time this edition is published we will be in a position to furnish aluminum casements. We invite your inquiries for complete information.

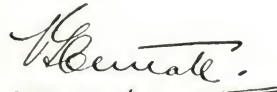
OUR GUARANTEE

AND

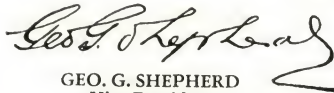
STANDARDS OF MATERIAL AND WORKMANSHIP

CRITTALL Casement Windows as described in the following pages are the result of many years of specialized experience and continuous improvement. Only materials which have been carefully selected and thoroughly tested are used. Experienced workmen assemble and fit them, and each window is subjected to rigid inspection before shipment. We maintain an efficient corps of mechanics in each section of the country to install our windows, and urge architects to insist on the performance of this work by the manufacturer.

When we install Universal Casements or Norman Casements we guarantee them wind and water tight, without the use of weatherstrips of any kind. When circumstances do not permit us to perform the installation work, we pledge ourselves to deal justly with our customers; to make any necessary adjustments without charge where possible or at only nominal expense; and to interpret our responsibility in a liberal manner to the end that the customer may always be satisfied with the completed installation. Stanwin Casements are less expensive windows, produced in great quantities and designed for less particular use, so they cannot measure up to the efficiency of Universal and Norman Casements, but when properly installed we guarantee them to be absolutely weathertight and sufficiently windtight for average conditions.



V. G. CRITTALL
President

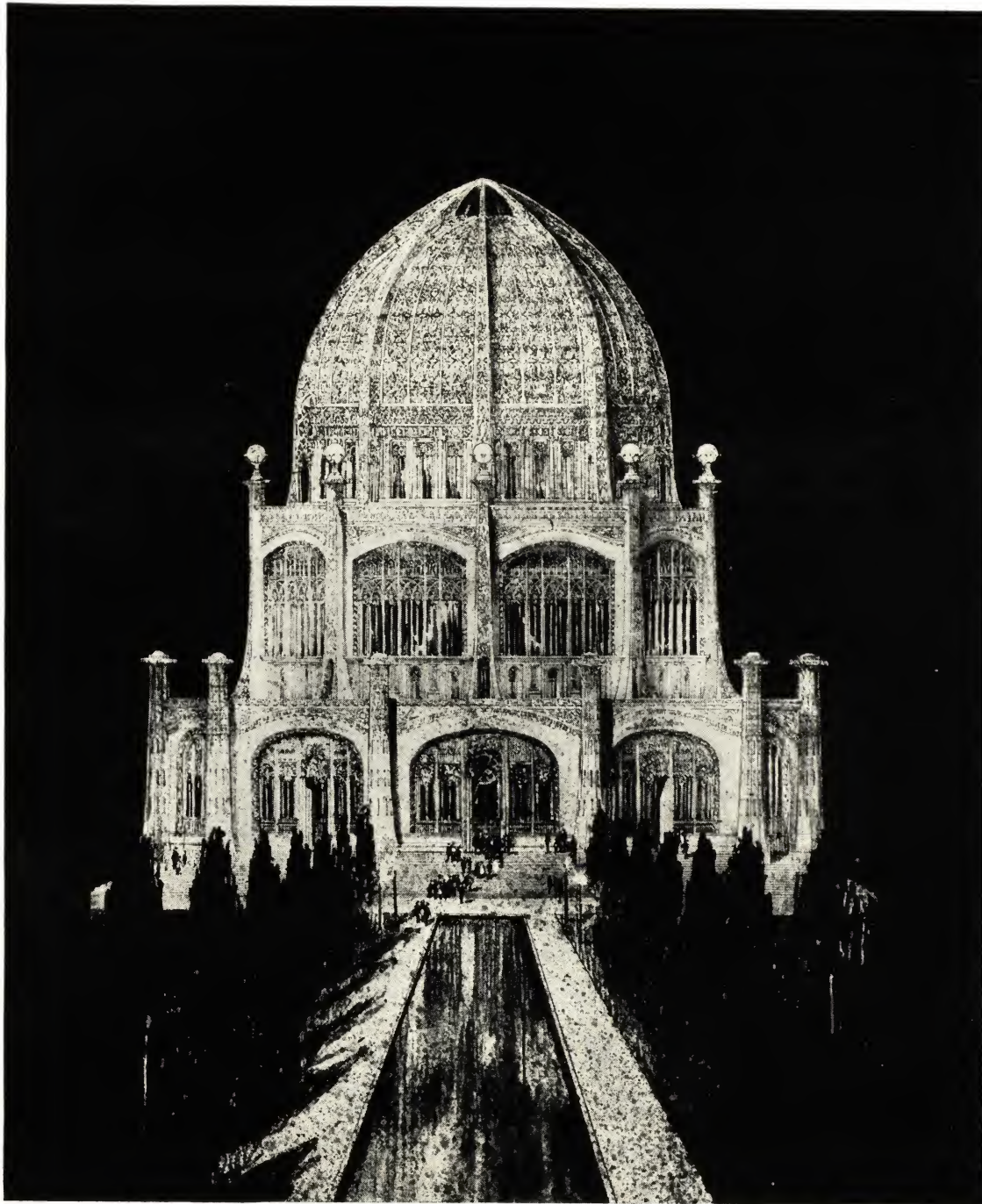


GEO. G. SHEPHERD
Vice President



KARL F. JORSS
Vice President

UNIVERSAL CASEMENTS



BAHA'I TEMPLE, WILMETTE, ILL.

Louis Bourgeois (deceased), Architect

Benjamin B. Shapiro, Consulting Engineer and in charge of completion, Research Service, Managing and Supervising Engineers, Washington, D. C.

UNIVERSAL CASEMENTS

CRITTALL CASEMENT WINDOW COMPANY

DETROIT, MICHIGAN

THE Universal Casement, in solid steel or bronze, is manufactured to meet architects' sizes, designs and most exacting specifications.

It is available in either heavy or medium weight sections, and being custom built, it may be furnished to suit any arrangement of ventilation required, within reasonable limitations.

Side hinged and top hinged outward opening case-

ments may be fitted with detachable flat screens and hardware specially designed to permit operation without moving the screen.

All hardware is solid bronze and conforms to accepted designs for casement fittings.

The excellence of the Universal Casement is attested to by its acceptance by foremost architects for use in thousands of the country's finest buildings.

SPECIFICATIONS

Windows—All windows shall be Crittall Universal Casements as manufactured by the CRITTALL CASEMENT WINDOW COMPANY, Detroit, Michigan. They shall be custom built to the sizes and designs shown on the drawings. Shop drawings must be submitted for the architect's approval before starting fabrication. They shall be fabricated from hot rolled steel casement sections weighing not less than 3.25 lbs. per lineal foot for medium section, and 4.50 lbs. per lineal foot for large section, including the swinging leaf and outer frame, but not including glass stops or any sub-frame. The table of maximum sizes on page 5 of Crittall's catalogue in Sweet's current edition shall govern the weight of section to be used for windows covered by this specification.

All corners shall be electrically welded and exposed surfaces ground smooth. Ventilating units shall have two points of contact all around. Sections shall be so designed that in composite openings glass will be in the same plane in stationary and ventilating units and sight lines will be uniform throughout.

Paint—All steel sections shall be cleaned free from rust and scale and painted one coat of red rust-resisting primer and one coat of dark gray primer, each coat baked on separately.

Glazing—(Optional) (Casements shall be furnished with spring clips for putty glazing from the outside.) or (Casements shall be fitted with moulded steel glazing stops for glazing from the inside. These shall be carefully mitred and individually fitted to each pane, using countersunk brass screws.)

Hardware—Shall be solid bronze, polished, finished a dark coinage color. After careful fitting at the factory, hardware shall be removed from the casements and shipped separately for protection of finish.

Note: Specify handles, stays, etc., for various types of windows by number. See pages 6, 7 and 8 for standard hardware and page 9 for special hardware.

Casements 5 ft. 0 in. high or over shall have a two-throw latch.

(When casements are extremely high or they are so located that it would be awkward to operate from near the sill, a three-throw latch should be specified.)

(Optional) (Hinges shall be solid bronze butts with hardened steel pins, 3/4 in. high for medium section, and 4 in. high for large section.) or (Hinges shall be drop forged steel pivots, cadmium plated, securely welded to the frames.)

Two hinges shall be applied to casements under 6 ft. 0 in. high and three hinges to casements 6 ft. 0 in. high and over.

Note: Steel pivot hinges are less expensive than bronze butts and facilitate fitting of casements without any sacrifice of efficiency, so they will be included in estimates unless bronze butts are specifically called for.

Note: When doors are included specify which of the following items are required: Bronze thresholds, double thick steel kick plates, cylinder locks, dummy lock to match, concealed Cremorne bolt lock, door holders, friction stays, bronze top and bottom bolts.

Frames—(Optional) The window manufacturer shall furnish and deliver to the building site, frames of 12-gauge pressed metal as shown on the drawings. These shall set in place, plumb and square, and built in by the Mason Contractor. Caulking under another heading. See pages 15, 16, 17.

Fins—(Optional) Continuous angle fins shall be furnished for the head and jambs and installed with the casements. See pages 21, 27.

Erection—All windows shall be set in place and properly adjusted by the manufacturer, and all joints between the steel window and collateral construction shall be made tight with Crittall Mastic Cement, neatly pointed.

Notes to Be Included in Specifications of Others

Mason—When pressed metal frames are used, specify that the mason shall set them in place, plumb and square, and build them in. Caulking under this heading or a special heading.

Glazier—When steel glazing stops are used, insist that the glazier remove them from one pane at a time and after placing glass, screw stops back into place before proceeding with the next pane. For large lights specify that the glazier use wood wedges as directed by casement manufacturer. A good grade of steel sash putty should be specified.

Painter—Prime coats only are applied by the manufacturer. Specify that the painting contractor shall apply in the field two coats of the desired color and quality.

MAXIMUM SIZES

Note—Dimensions may be exceeded only upon consultation with manufacturer.	Large section		Medium section	
	Width	Height	Width	Height
Side hung casements.....	3' 0"	8' 0"	2' 6"	6' 0"
Vertically pivoted casements.	4' 6"	8' 0"	3' 6"	6' 0"
Folding casements and doors.	6' 0"	8' 0"	5' 0"	6' 0"
Top hung and bottom hung casements	5' 0"	4' 0"	4' 0"	3' 0"
Horizontally pivoted casements	5' 6"	4' 0"	4' 6"	3' 6"
Projected casements	5' 0"	3' 6"	4' 0"	2' 6"

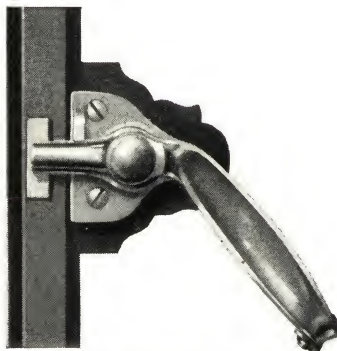
Note: This table is based on our experience of the limitations of medium and large sections under usual conditions. In some cases these limits might be extended safely, but only after consulting our Engineering Department. Sizes of transoms may be increased when mechanically operated.

UNIVERSAL CASEMENTS

STANDARD HARDWARE



SCREENED CASEMENT
HANDLE NO. 1270



HANDLE NO. 1006
PLATE NO. 225



HANDLE NO. 1185
NO PLATE



TWO THROW LATCH
HANDLE NO. 211
PLATE NO. 225

Handles Nos. 1006, 1185 and 211 are standard and included in all estimates unless otherwise specified. For inward opening casements handle No. 1185 may be applied direct to the section without a back plate when it is desirable to show as little as possible of the handle from the outside. Handle No. 1270 is the standard handle for use in connection with flat screened casements. See page 42 for further illustration and description. Any handle on this page may be furnished with two throw latches. Night latches giving a small amount of ventilation without rattling may be furnished with any handle at slight additional cost.



TWO THROW LATCH
HANDLE NO. 1185
PLATE NO. 285

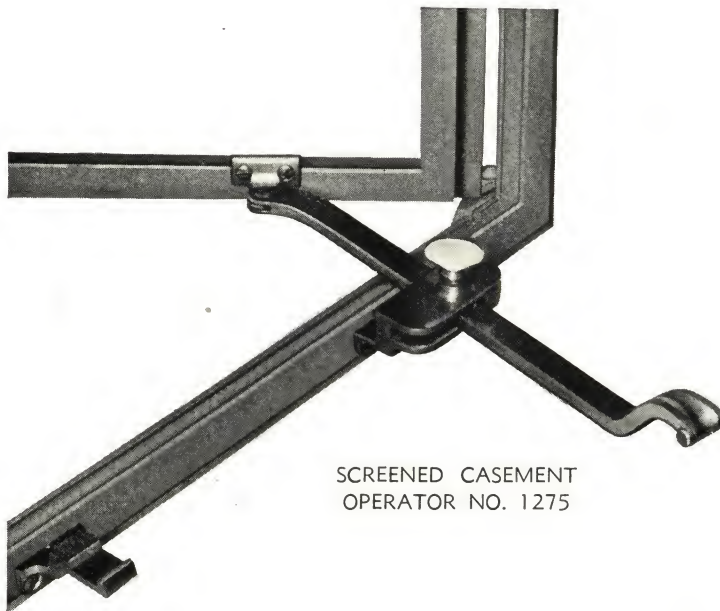
UNIVERSAL CASEMENTS

STANDARD HARDWARE



HANDLE NO. 310 FOR
CREMORNE BOLT

Handle No. 385 with Cremorne Bolt illustrated at right is standard for pairs of casements without fixed meeting rail, and matches handle No. 1185 used on single casements. Handle No. 310 is furnished without extra cost when desired, but does not match other single casement handles. Friction stay is the standard adjuster for casements and is applied at the head of the window. Operator No. 1275 is for use in connection with flat screened casements. See page 42 for further illustration and description.



SCREENED CASEMENT
OPERATOR NO. 1275



FRICTION STAY



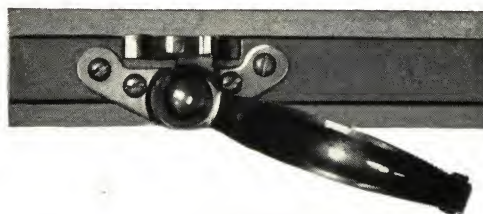
CREMORNE BOLT WITH
HANDLE NO. 385

UNIVERSAL CASEMENTS

STANDARD HARDWARE



HANDLE NO. 1260

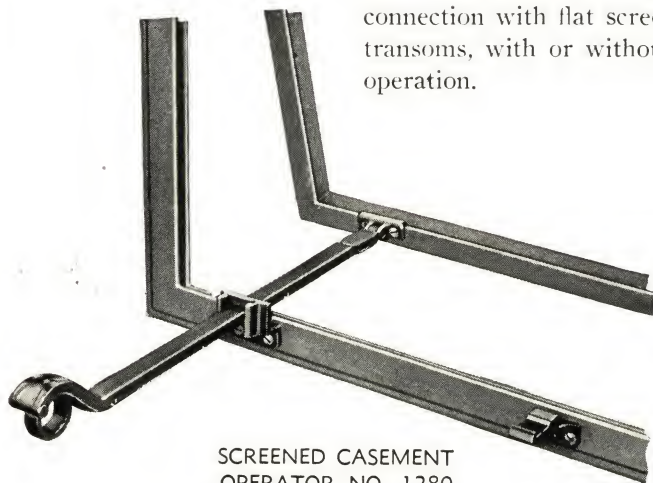


HANDLE NO. 1185

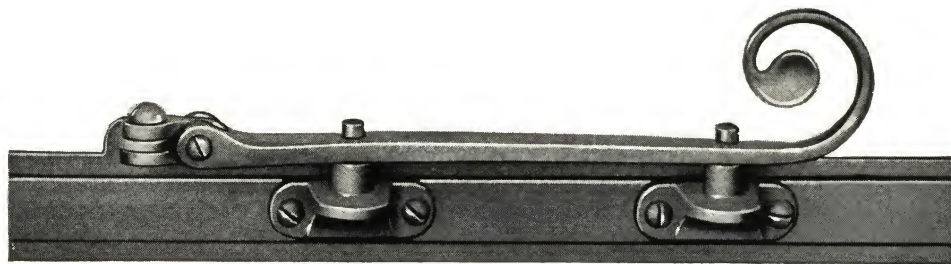
Handles Nos. 1260 and 1185 are standard for projecting in casements. The latter may also be used for projecting out casements within reach for hand operation. Spring catches No. 2-AS and No. 3-AS for pole or cord operation are standard for bottom hinged and horizontally pivoted casements. No. 2-AS may be used on projecting casements for pole operation. Peg stay No. 107 is standard for top hinged and projecting out casements. Operator No. 1280 is for use in connection with flat screened top hinged transoms, with or without ring for pole operation.



SPRING CATCH 3-AS

SCREENED CASEMENT
OPERATOR NO. 1280

SPRING CATCH 2-AS



PEG STAY NO. 107

UNIVERSAL CASEMENTS

SPECIAL HARDWARE



HANDLE NO. 206
PLATE NO. 210

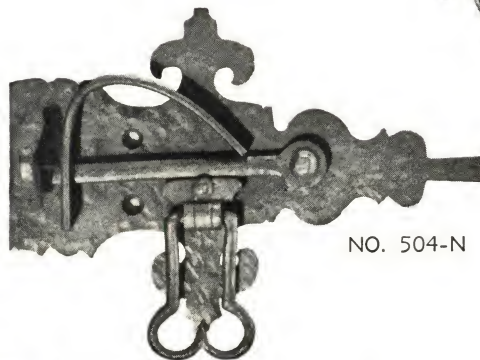


HANDLE NO. 206
PLATE NO. 229

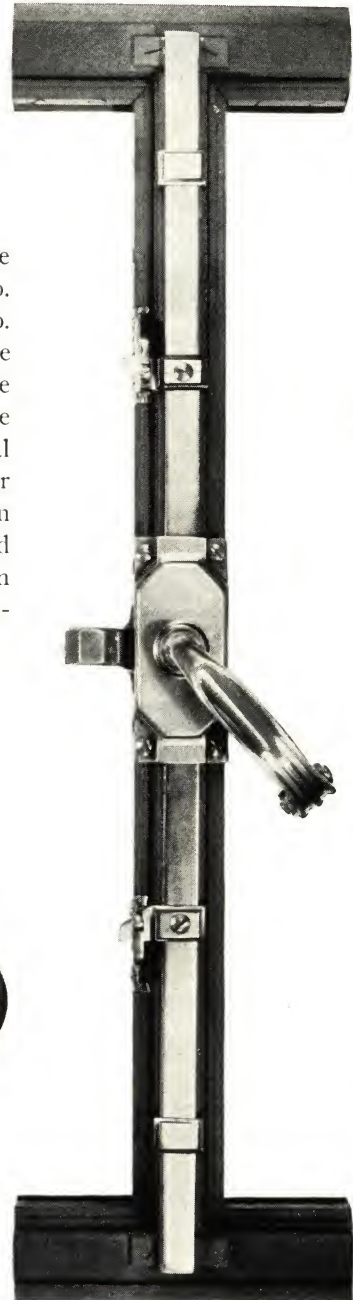
Fittings illustrated here may be furnished at extra cost. Handle No. 206 for single casements matches No. 306 for double casements. Handle No. 504-N is shown as an example of hand wrought iron hardware which may be furnished by special arrangement with the architect for fine work. Sliding Stay No. 108 in solid bronze is used on side hinged casements. Cam Stay is for use on top hinged transoms for pole operation.



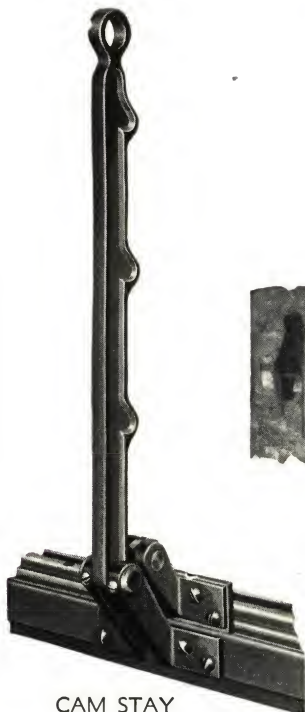
NO. 207



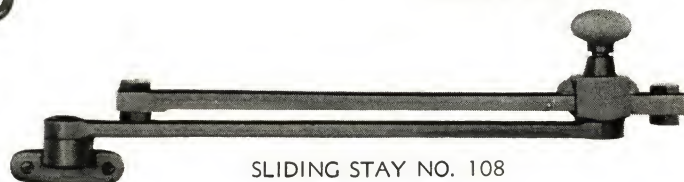
NO. 504-N



CREMORNE BOLT WITH
HANDLE NO. 306



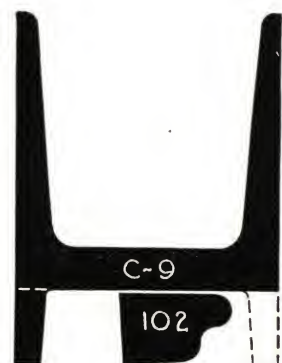
CAM STAY



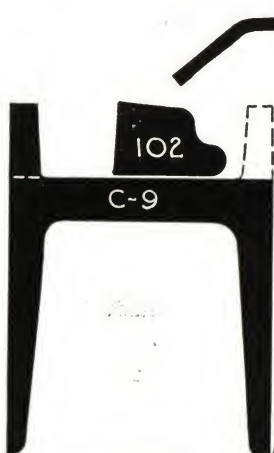
SLIDING STAY NO. 108

UNIVERSAL CASEMENTS

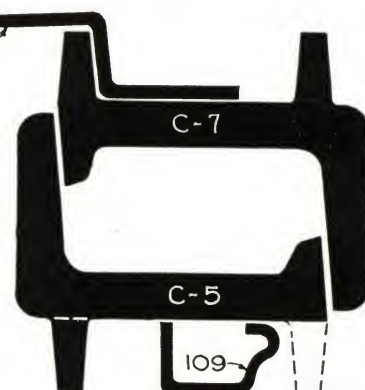
FULL SIZE HEAVY SECTIONS



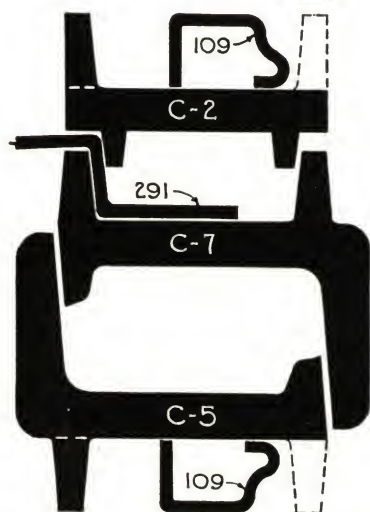
HEAD-JAMB
OR SILL (A)
FIXED



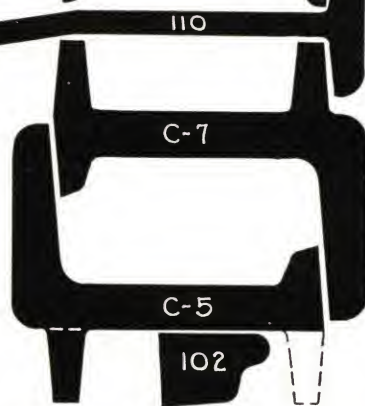
TRANSOM BAR (C)
(COMBINATION SHOWN "ACD")



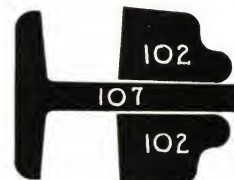
HEAD OR JAMB (D)



TRANSOM BAR (B)
(COMBINATION SHOWN "BD")



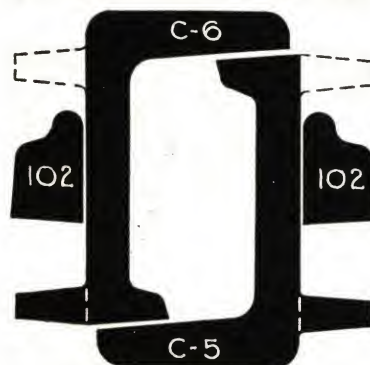
TRANSOM BAR (C)
(COMBINATION SHOWN "ACD")



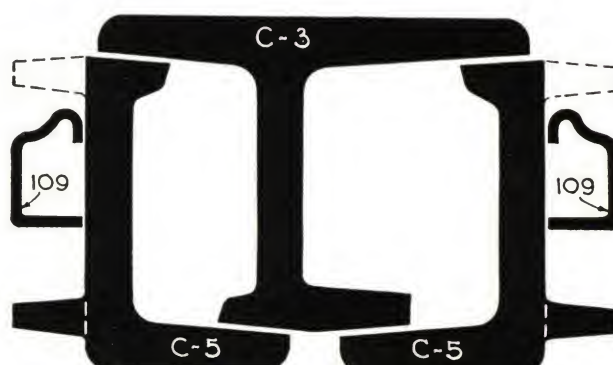
MUNTIN (E)



SILL (F)



MEETING RAIL (G)
(OPEN OUT OR OPEN IN FOLDER)



FIXED MEETING RAIL (H)
(BETWEEN PAIR OF SIDE HINGED CASEMENTS)

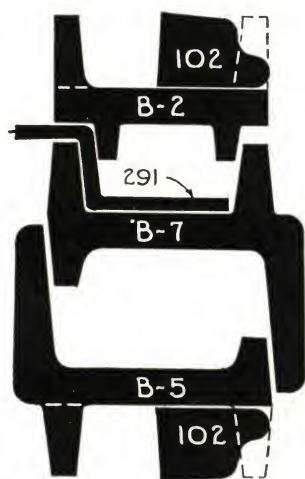
NOTES
GLAZING STOPS MAY BE FURNISHED IN EITHER SOLID ROLLED OR HOLLOW ROLLED TYPES AS SPECIFIED
DOTTED LINES SHOW SECTIONS USED FOR OUTSIDE PUTTY GLAZING.

UNIVERSAL CASEMENTS

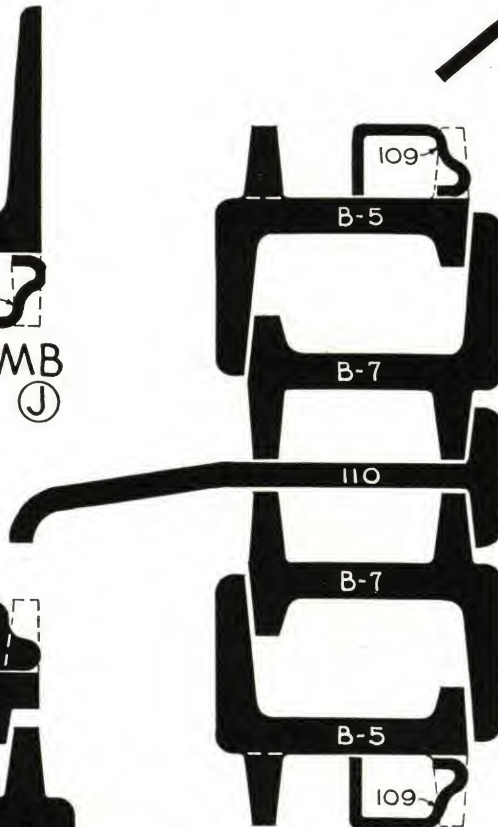
FULL SIZE MEDIUM SECTIONS



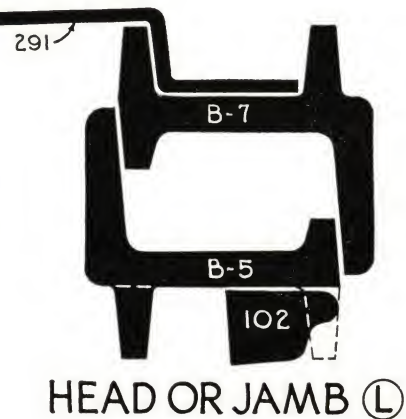
HEAD-JAMB
OR SILL (J)
FIXED



TRANSM BAR (K)
(COMBINATION SHOWN - "KL")



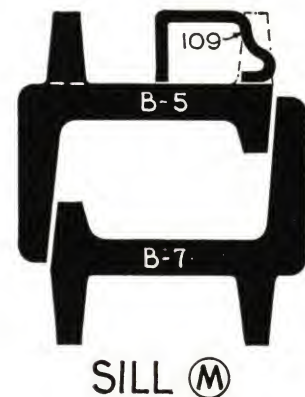
TRANSM BAR (C)
(COMBINATION SHOWN - "MCL")



HEAD OR JAMB (L)



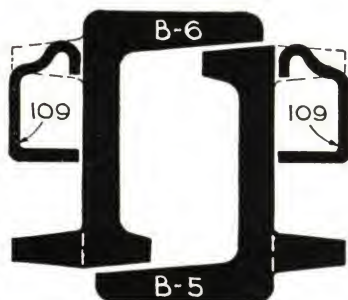
MUNTIN (E)



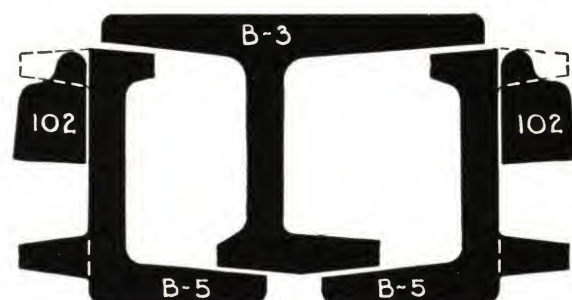
SILL (M)

NOTES

GLAZING STOPS MAY BE FURNISHED IN EITHER SOLID ROLLED OR HOLLOW ROLLED TYPES AS SPECIFIED. DOTTED LINES SHOW SECTIONS USED FOR OUTSIDE PUTTY GLAZING.



MEETING RAIL (N)
(OPEN OUT OR OPEN IN FOLDER)



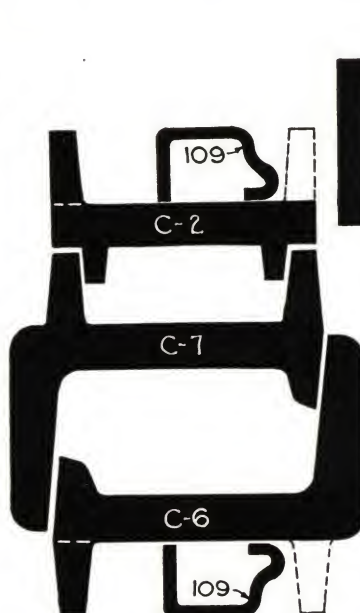
FIXED MEETING RAIL (O)
(BETWEEN PAIR OF SIDE HINGED CASEMENTS)

UNIVERSAL CASEMENTS

FULL SIZE HEAVY SECTIONS



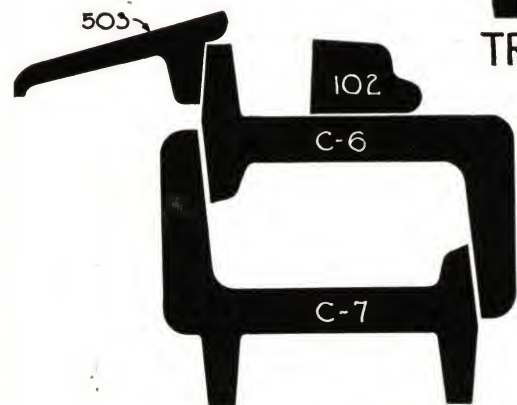
HEAD OR JAMB
(P)



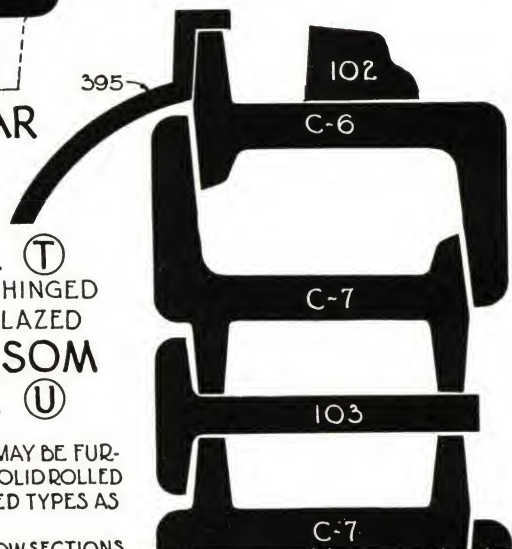
TRANSOM BAR
(B)

(COMB. SHOWN - "PB")

SILL (T)
BOTTOM HINGED
BEAD GLAZED
TRANSOM
BAR (U)

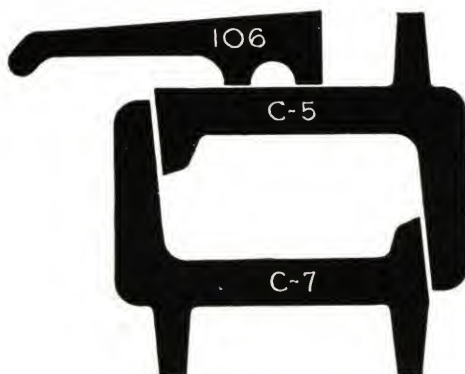


SILL (Q)
SIDE HINGED - BEAD GLAZED

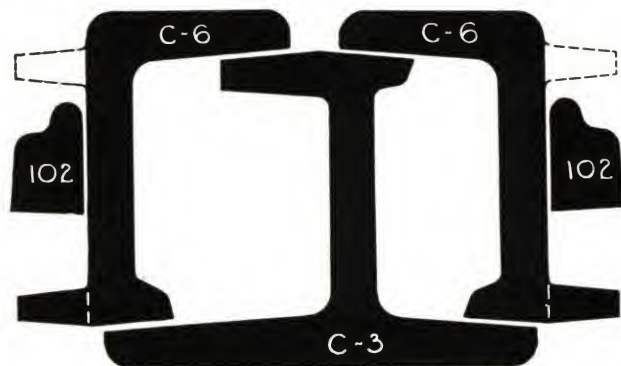


(ABOVE COMBINATION IS "TUP")

GLAZING STOPS MAY BE FURNISHED IN EITHER SOLID ROLLED OR HOLLOW ROLLED TYPES AS SPECIFIED.
DOTTED LINES SHOW SECTIONS USED FOR OUTSIDE PUTTY GLAZING



SILL (R)
SIDE HINGED - PUTTY GLAZED



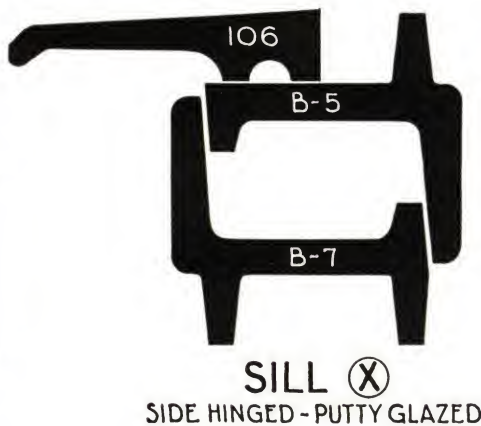
FIXED MEETING RAIL (H)
(BETWEEN PAIR OF SIDE HINGED CASEMENTS)

UNIVERSAL CASEMENTS

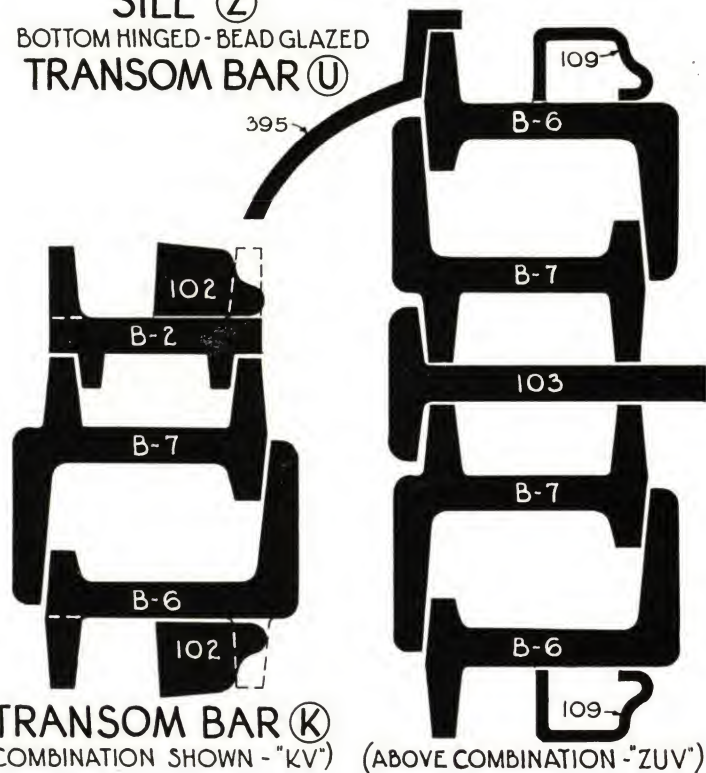
FULL SIZE MEDIUM SECTIONS



NOTES
GLAZING STOPS MAY BE FURNISHED IN EITHER SOLID ROLLED OR HOLLOW ROLLED TYPES AS SPECIFIED
DOTTED LINES SHOW SECTIONS USED FOR OUTSIDE PUTTY GLAZING

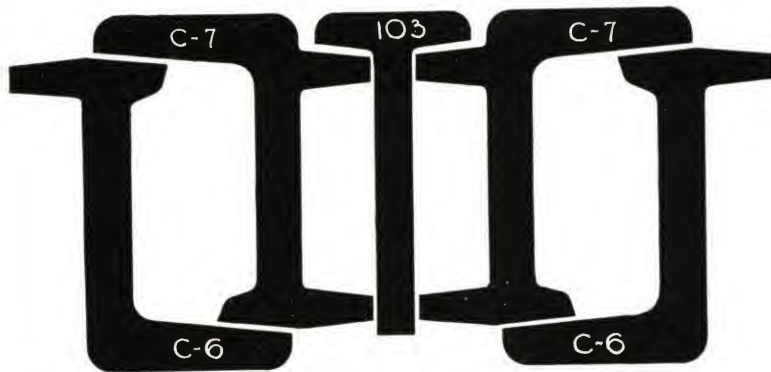


SILL (Z)
BOTTOM HINGED - BEAD GLAZED
TRANSOM BAR (U)

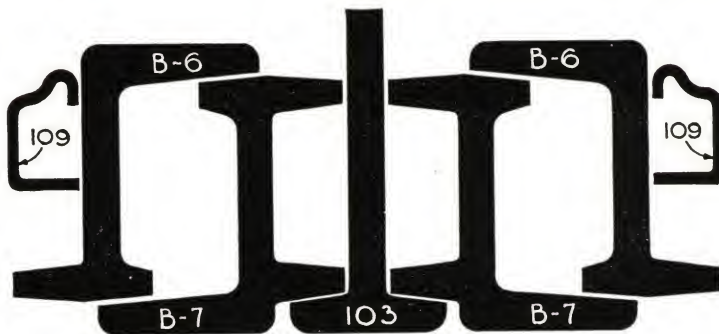


UNIVERSAL CASEMENTS

FULL SIZE SECTIONS



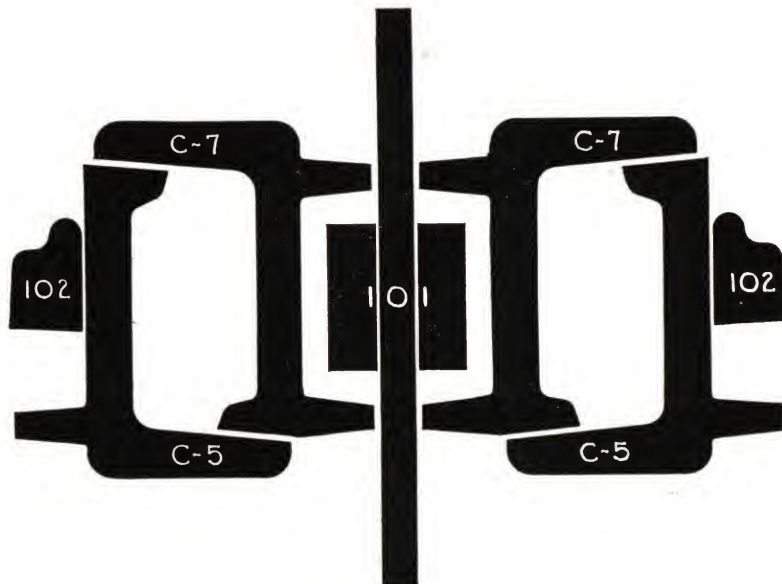
MULLION ①
WITH HEAVY SECTION - OPEN OUT



MULLION ①
WITH MEDIUM SECTION - OPEN IN



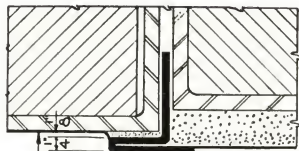
ANGLE FIN



MULLION No 101
FOR GREATER STRENGTH

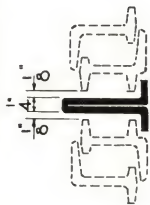
UNIVERSAL CASEMENTS

BUILT IN UTILITY FRAMES

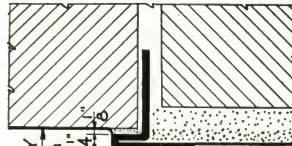


MASONRY OPENING

HEAD

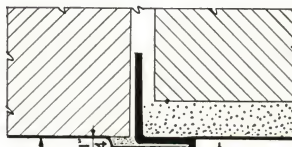


TRANSOM OR
MULLION



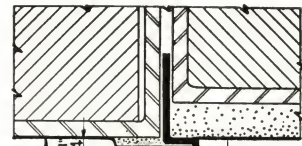
MASONRY
OPENING

OPEN OUT



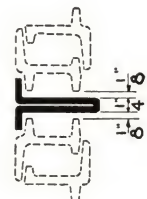
MASONRY
OPENING

OPEN IN
CIRCULAR HEADS



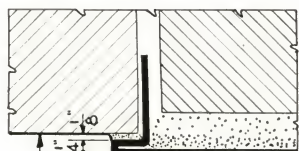
MASONRY OPENING

HEAD



TRANSOM OR
MULLION

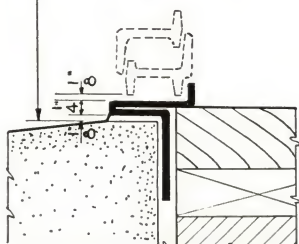
SCALE OF DETAILS - 3" = 1'-0"



MASONRY OPENING

JAMB

SILL

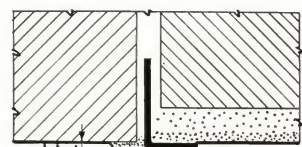


OPEN OUT

TWELVE GAUGE PRESSED METAL FRAMES ARE FURNISHED BY US, DELIVERED TO THE BUILDING SITE, TO BE SET IN PLACE, BUILT IN AND POINTED BY THE MASON CONTRACTOR AS THE WALLS GO UP. NOTATION OF THIS SHOULD BE MADE IN THE MASONRY SPECIFICATIONS.



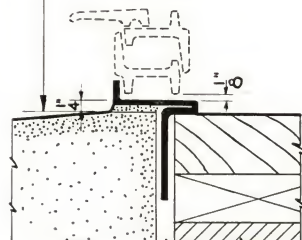
TYPICAL FULL SIZE DETAIL



MASONRY OPENING

JAMB

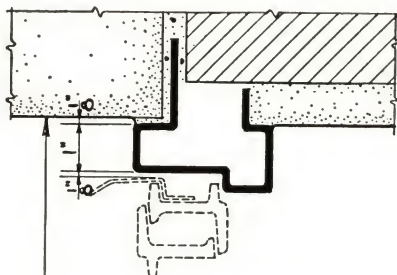
SILL



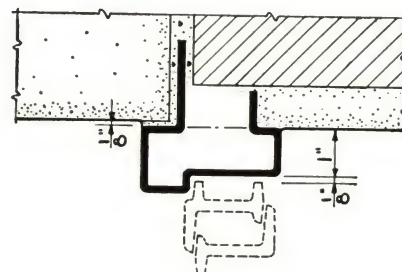
OPEN IN

UNIVERSAL CASEMENTS

SINGLE REBATED HOLLOW METAL FRAMES



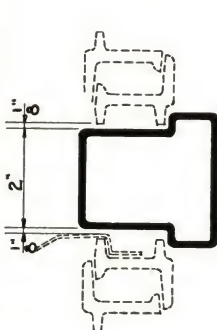
HEAD OR JAMB



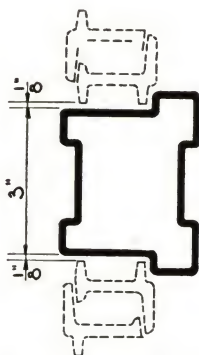
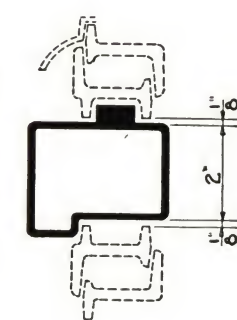
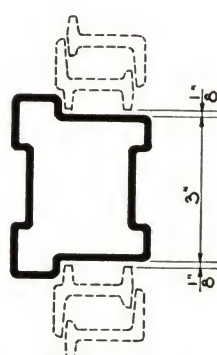
HEAD OR JAMB

SCALE - 3"=1'-0"

OPENING

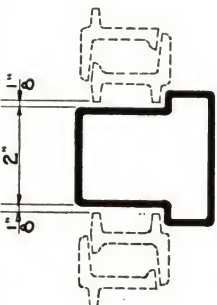


TRANSOM

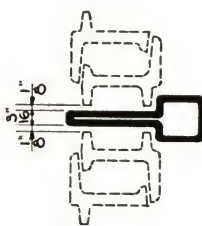
ALTERNATE TRANSOM OR MULLION
(NOTE - EITHER OR BOTH SIDES MAY BE PANELLED)

TRANSOM

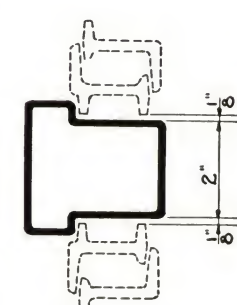
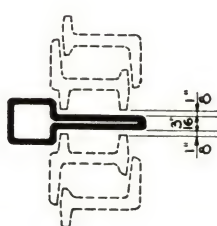
MASONRY



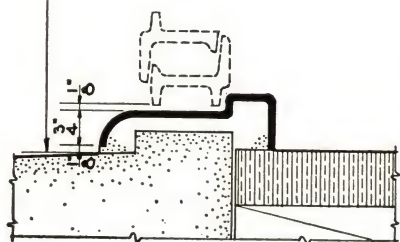
MULLION



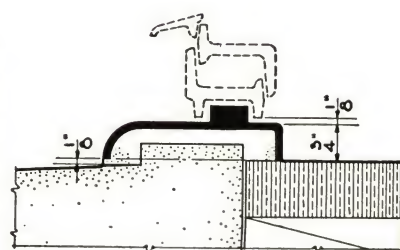
ALTERNATE TRANSOM OR MULLION



MULLION

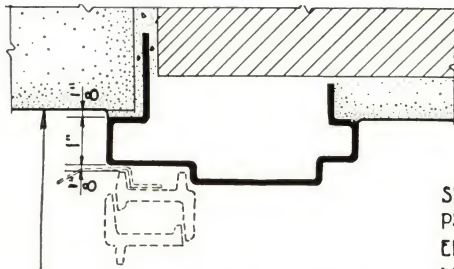
SILL
OUT-OPENING

NOTE
TWELVE GAUGE PRESSED METAL
FRAMES ARE FURNISHED BY US,
DELIVERED TO THE BUILDING
SITE, TO BE SET IN PLACE, BUILT
IN AND POINTED BY THE MASON
CONTRACTOR AS THE WALLS GO
UP. NOTATION OF THIS SHOULD BE
MADE IN MASONRY SPECIFICATIONS.

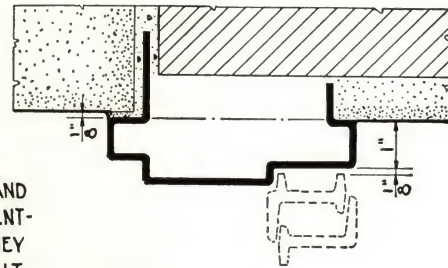
SILL
IN-OPENING

UNIVERSAL CASEMENTS

DOUBLE REBATED HOLLOW METAL FRAMES



HEAD OR JAMB

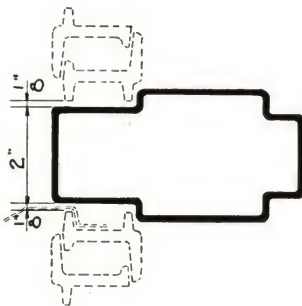


HEAD OR JAMB

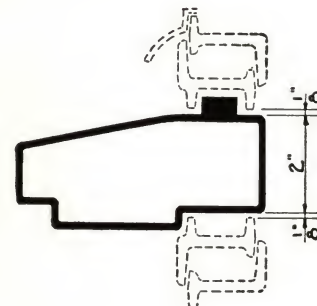
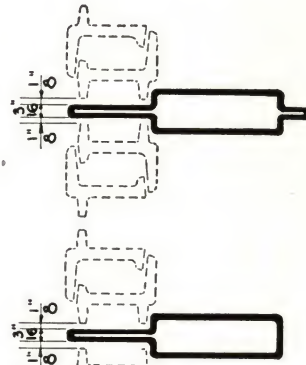
NOTE
SECTIONS SHOWN ON THIS AND
PRECEDING PAGE ARE PRESENTED
AS STANDARD SHAPES THEY
MAY BE MODIFIED TO SUIT
SPECIAL DESIGNS OR ANY
PARTICULAR MASONRY DETAIL

SCALE - 3"=1'-0"

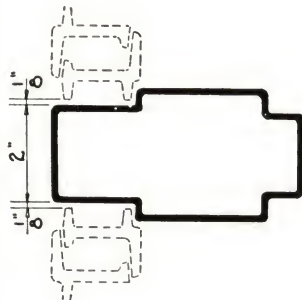
MASONRY OPENING



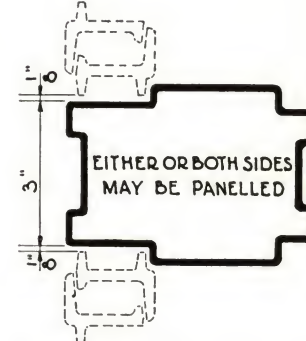
TRANSOM



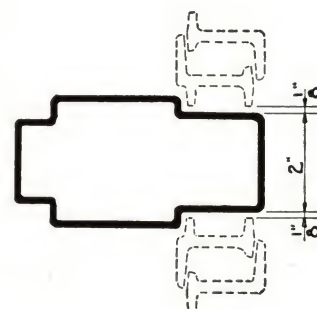
TRANSOM



MULLION

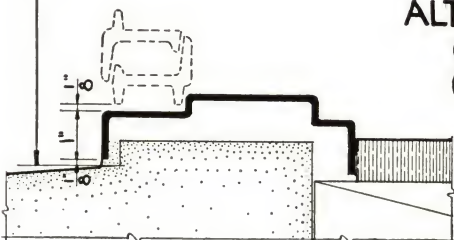
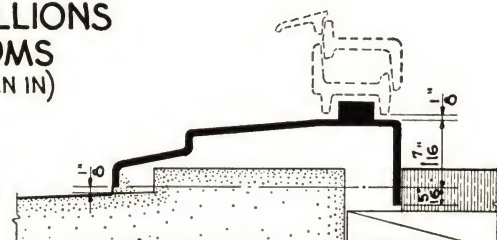


EITHER OR BOTH SIDES
MAY BE PANELLED



MULLION

ALTERNATE MULLIONS
OR TRANSOMS
(OPEN OUT OR OPEN IN)

SILL
OUT-OPENINGSILL
IN-OPENING

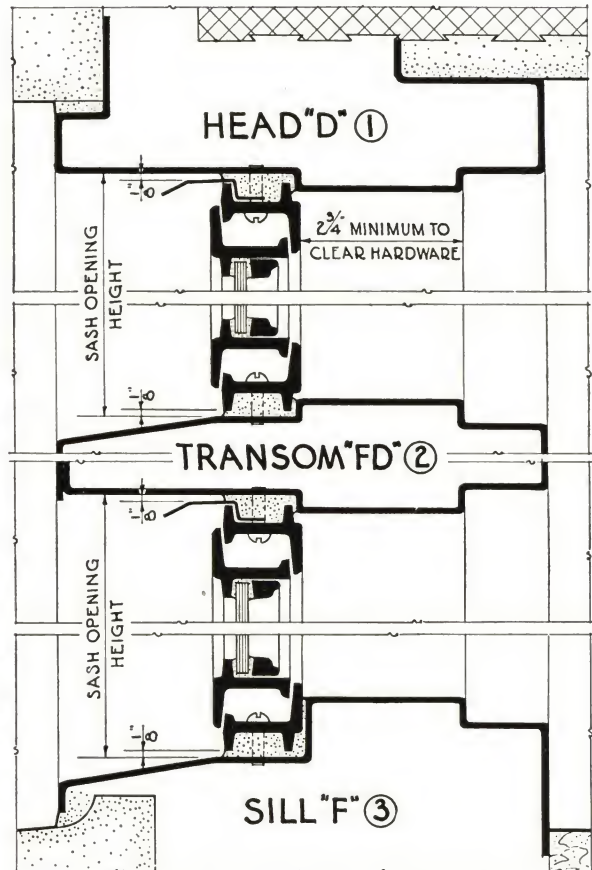
UNIVERSAL CASEMENTS

SIDE HINGED—OPEN OUT—TOP HINGED TRANSOM

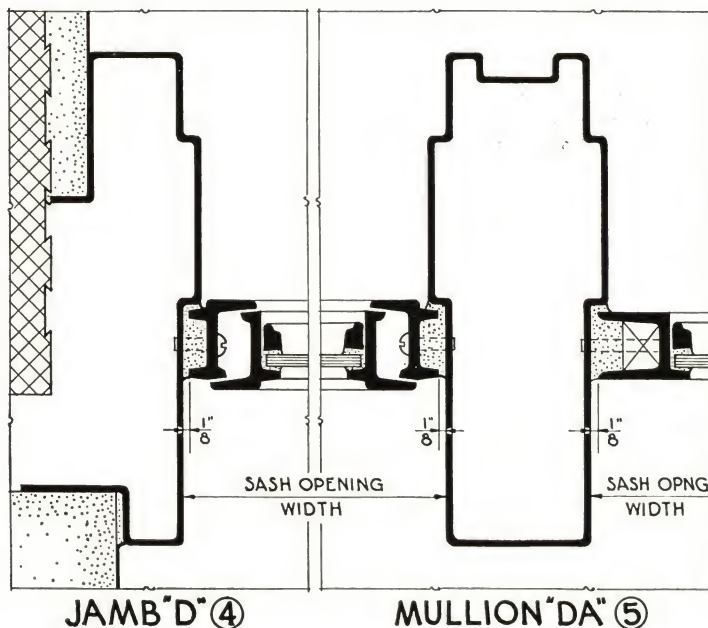


ATLANTA TOLL BUILDING - SOUTHERN BELL
TELEPHONE COMPANY ATLANTA - GA.
MARYE, ALGER AND VINOUR - ARCHITECTS.

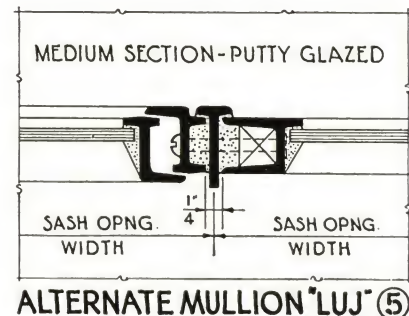
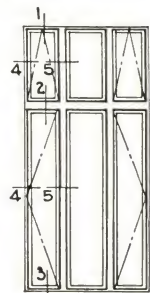
NOTE: ILLUSTRATION SHOWS BUILDING AS IT WILL APPEAR UPON EARLY
COMPLETION. LOWER FLOORS ARE NOW FINISHED AND OCCUPIED -



SCALE OF DETAILS - 3" = 1'-0"

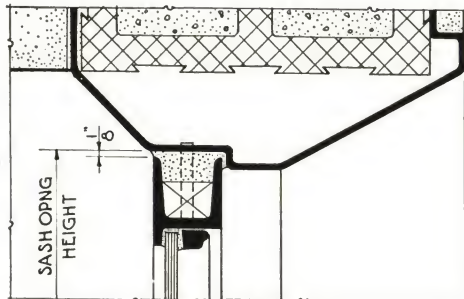


NOTE
SECTION LETTERS REFER
TO MARKING OF FULL
SIZE SECTIONS FOR
UNIVERSAL CASEMENTS
NUMBERS REFER TO
1/8 SCALE ELEVATION
SHOWN AT RIGHT

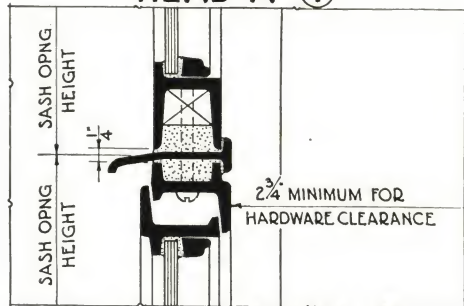


UNIVERSAL CASEMENTS

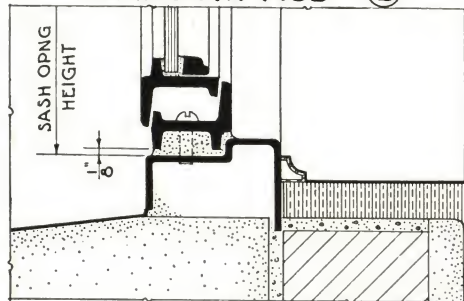
FOLDER—OPEN OUT—FIXED TRANSOM



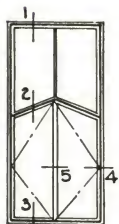
HEAD "A" ①



TRANSOM "ACD" ②

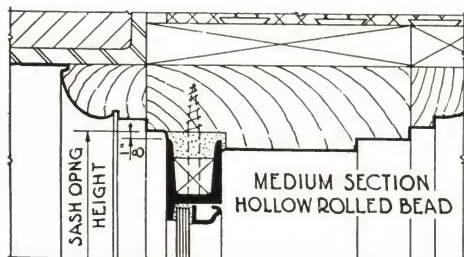


SILL "F" ③

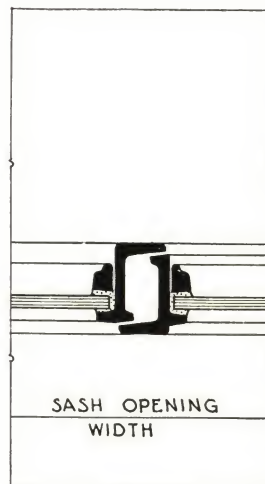


NOTE
SECTION LETTERS REFER TO
MARKING OF FULL SIZE SEC-
TIONS FOR UNIVERSAL CASE-
MENTS. NUMBERS REFER TO
ELEVATION SHOWN AT LEFT.

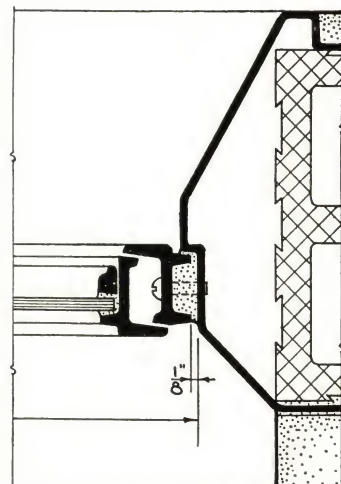
SCALE OF DETAILS - 3" = 1'-0"



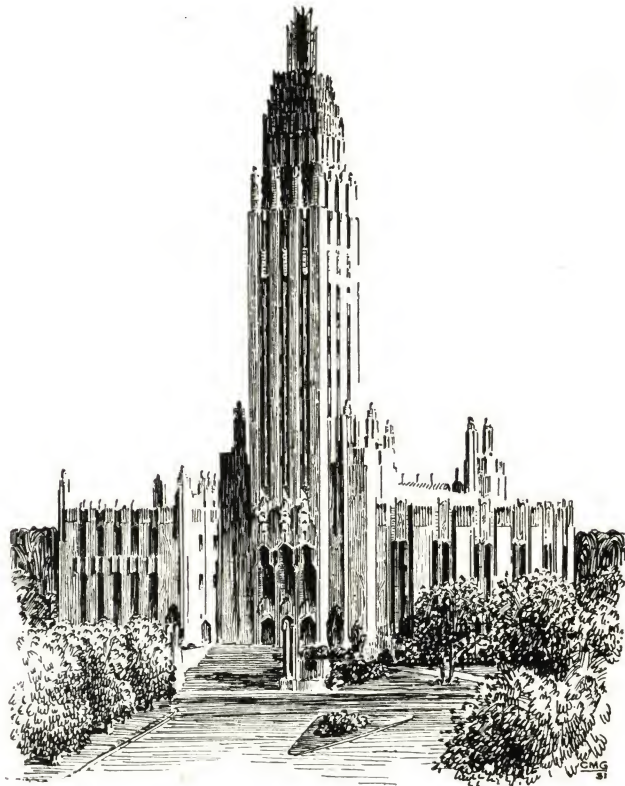
ALTERNATE HEAD "J" ①



MEETING RAIL "G" ⑤



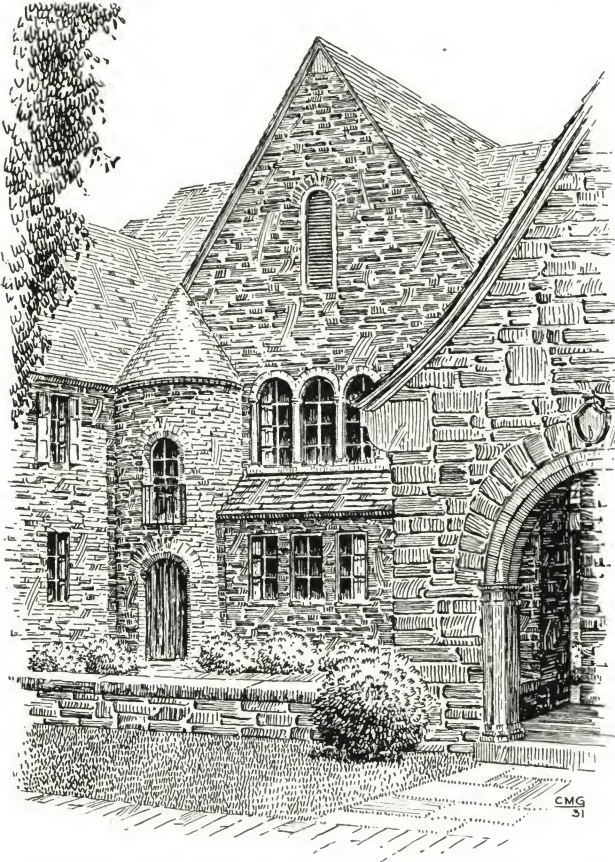
JAMB "D" ④



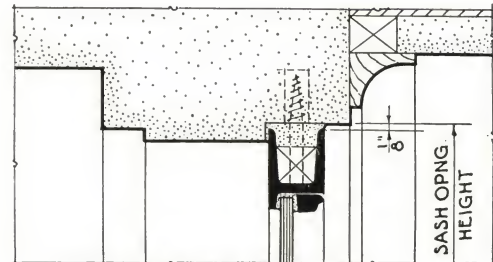
BOSTON AVENUE M.E. CHURCH
TULSA, OKLAHOMA
RUSH, ENDACOTT & GOFF - ARCHTS

UNIVERSAL CASEMENTS

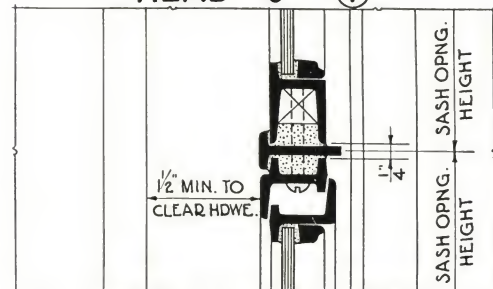
SIDE HINGED—OPEN IN—FIXED TRANSOM



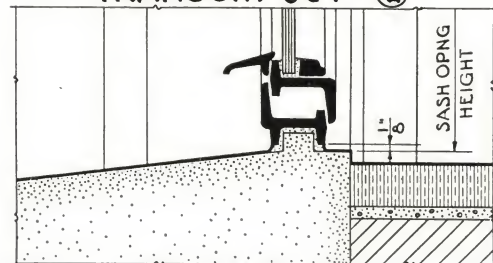
JULIUS FLEISCHMANN JR. RESIDENCE - MADEIRA, OHIO
STANLEY MATTHEWS AND C.W. SHORT - ARCHITECTS.



HEAD "J" ①

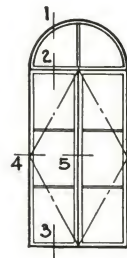


TRANSOM "JUV" ②

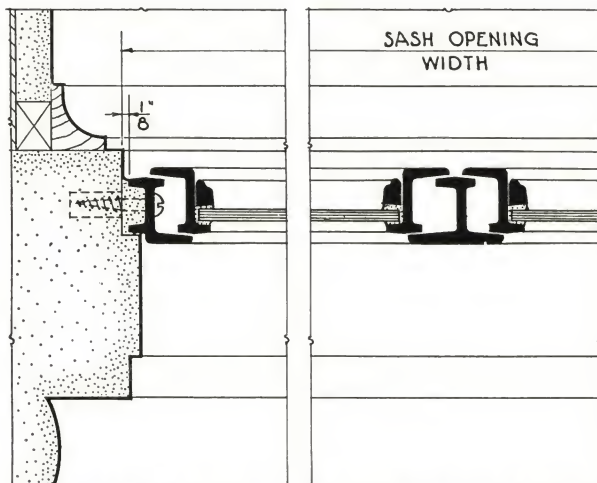


SILL "W" ③

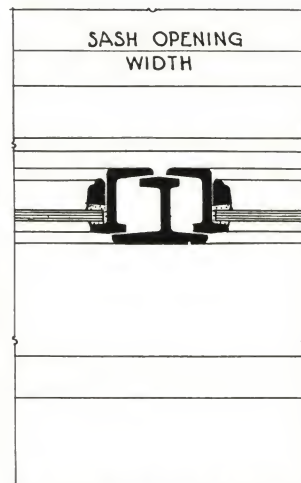
NOTE
SECTION LETTERS REFER TO
MARKING OF FULL SIZE SEC-
TIONS FOR UNIVERSAL CASE-
MENTS. NUMBERS REFER TO
ELEVATION SHOWN AT RIGHT.



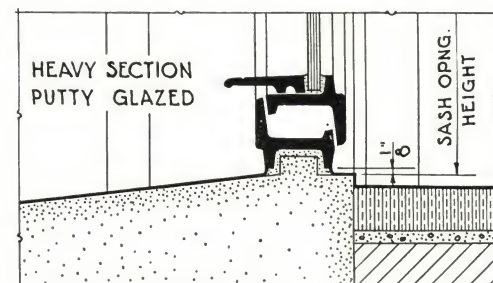
SCALE OF DETAILS - 3"-1'-0"



JAMB "V" ④



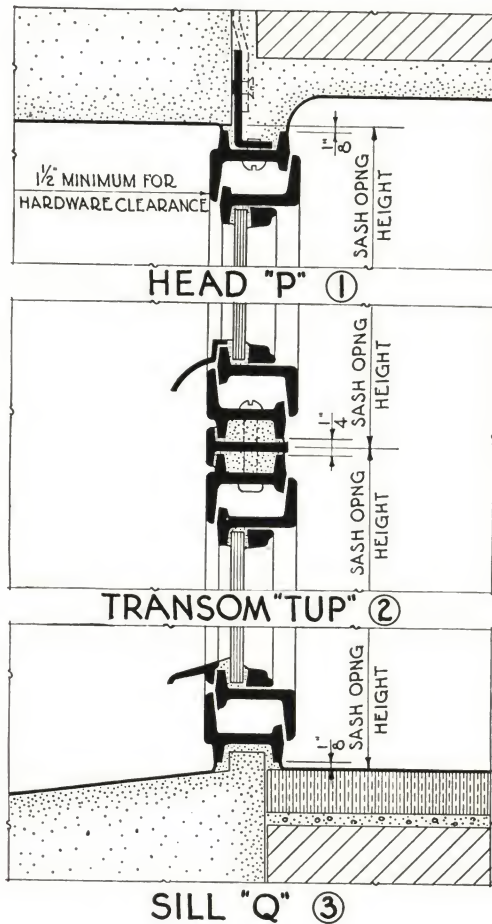
MEETING RAIL "O" ⑤



ALTERNATE SILL "R" ③

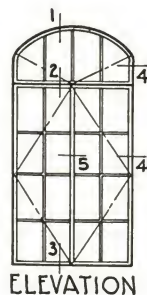
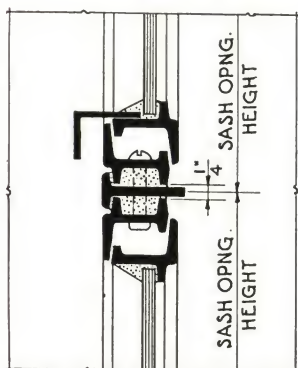
UNIVERSAL CASEMENTS

FOLDER—OPEN IN—BOTTOM HINGED TRANSOM

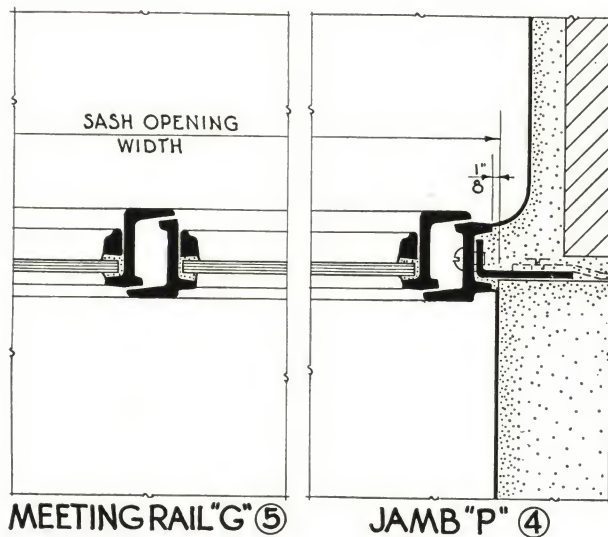


NOTE
SECTION LETTERS REFER TO MARKING
OF FULL SIZE SECTIONS FOR UNIVERSAL
CASEMENTS - NUMBERS REFER TO
ELEVATION SHOWN BELOW.

SCALE OF DETAILS ~ 3" = 1'-0"

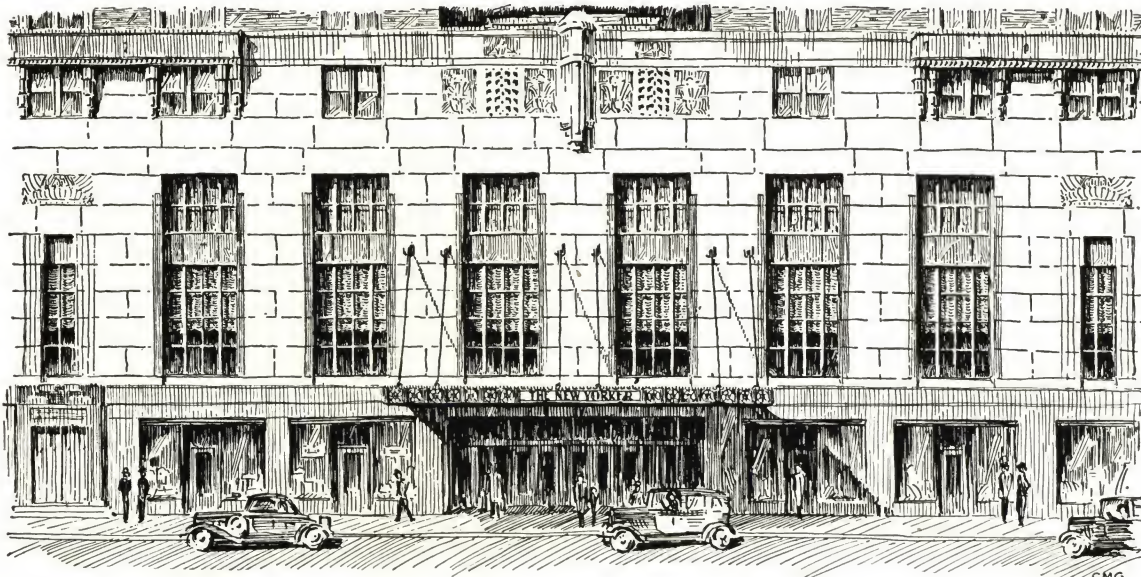


TRIBUNE TOWER CHICAGO, ILL.
JOHN M. HOWELLS & RAYMOND HOOD-ARCHTS.



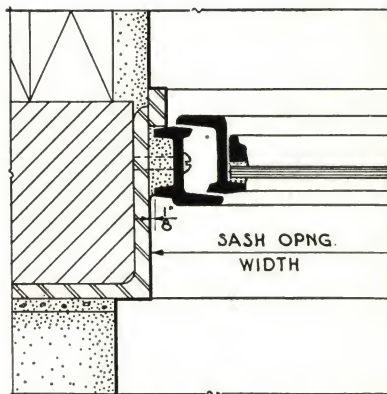
UNIVERSAL CASEMENTS

HORIZONTALLY PIVOTED CASEMENTS

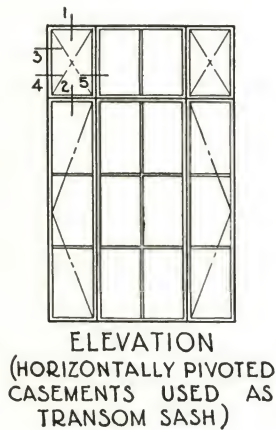


NEW YORKER HOTEL - NEW YORK CITY

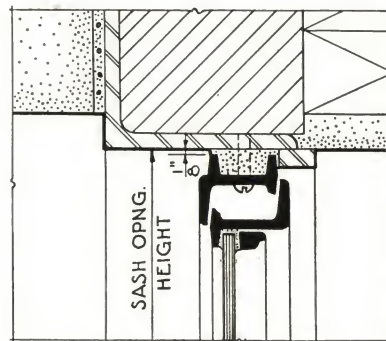
SUGARMAN AND BERGER ~ ARCHITECTS



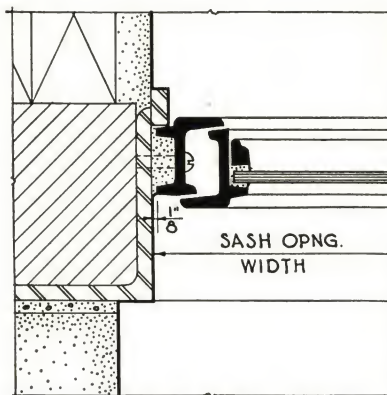
JAMB "P" (3)



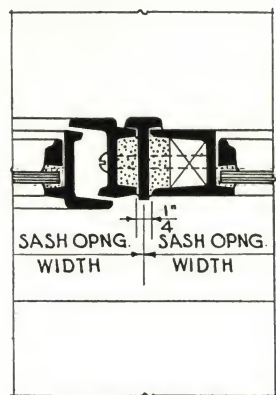
ELEVATION
(HORIZONTALLY PIVOTED
CASEMENTS USED AS
TRANSOM SASH)



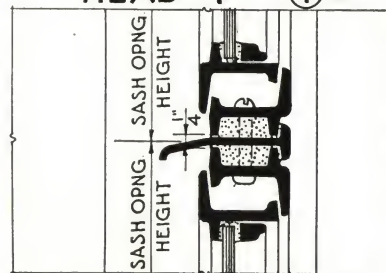
HEAD "P" ①



JAMB "D" ④



MULLION "DUA" ⑤



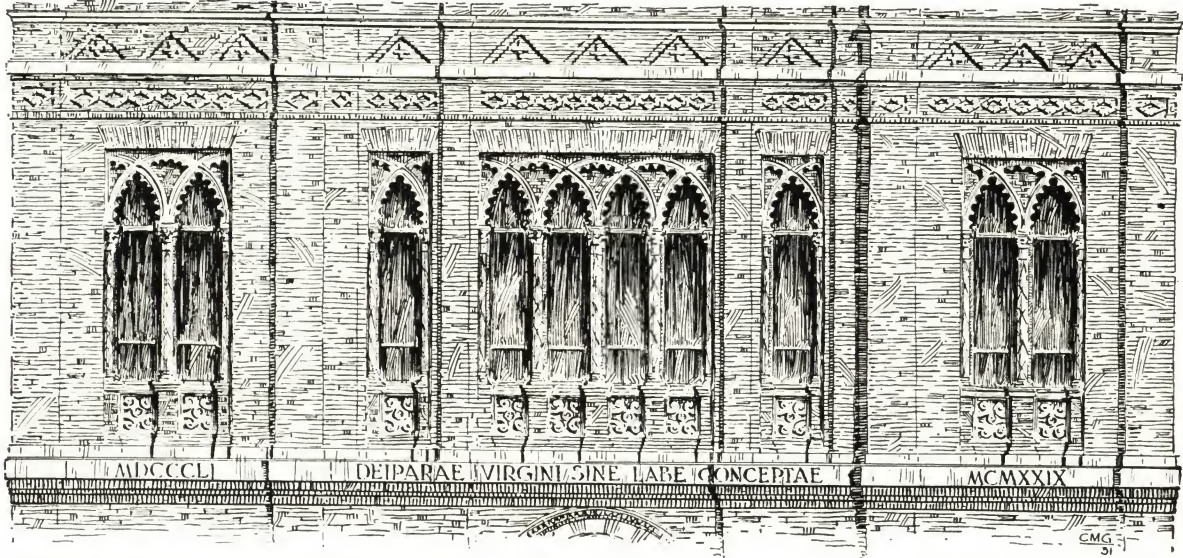
TRANSOM "FCD" (2)

NOTE: SECTION LETTERS REFER TO MARKING OF FULL SIZE SECTIONS FOR UNIVERSAL CASEMENTS. NUMBERS REFER TO ELEVATION SHOWN ABOVE.

SCALE OF DETAILS - 3" = 1' - 0"

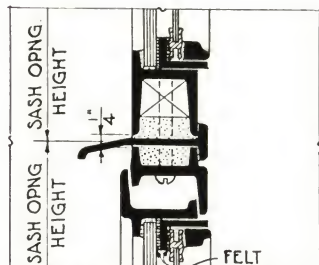
UNIVERSAL CASEMENTS

VERTICALLY PIVOTED CASEMENTS—DOUBLE GLAZING

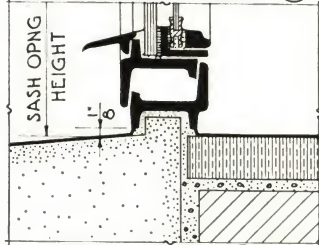


CHURCH OF THE IMMACULATE CONCEPTION
NEW ORLEANS, LA.

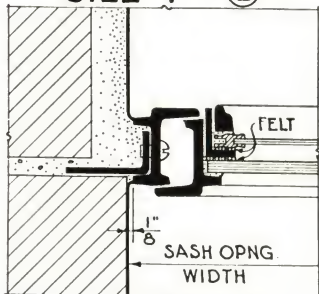
WOGAN & BERNARD
ARCHITECTS



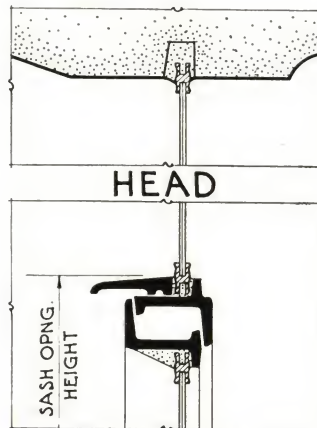
TRANSOM "ACD" ①



SILL "F" ②



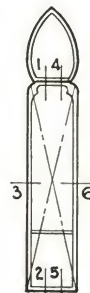
JAMB "D" ③



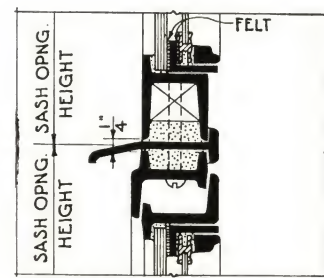
TRANSOM
DETAILS FOR GLAZING
DIRECT INTO MASONRY

NOTE
SECTION LETTERS REFER
TO MARKING OF FULL
SIZE SECTIONS FOR
UNIVERSAL CASEMENTS
NUMBERS REFER TO
1/8" SCALE ELEVATION
SHOWN AT RIGHT.

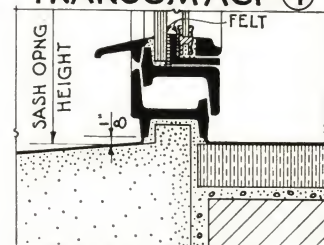
SCALE OF DETAILS
3" = 1'-0"



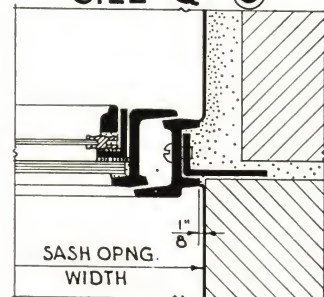
ELEVATION



TRANSOM "ACP" ④



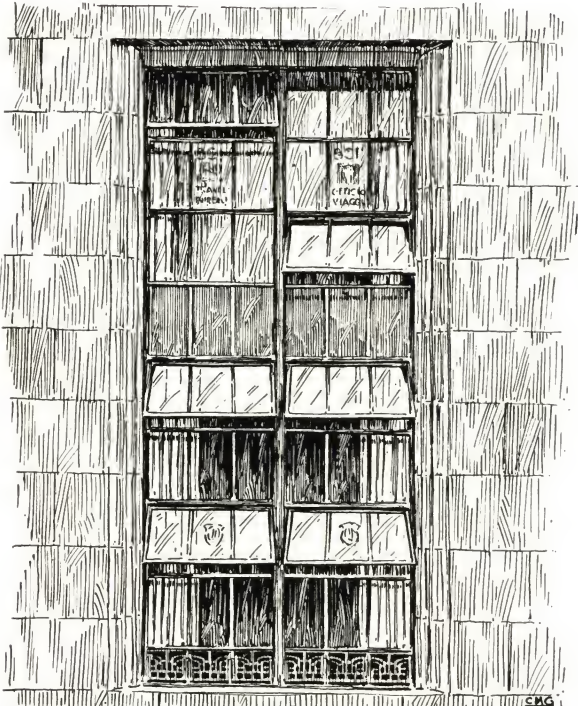
SILL "Q" ⑤



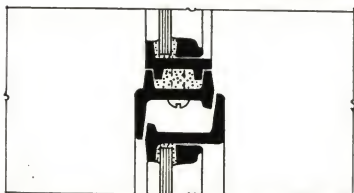
JAMB "P" ⑥

UNIVERSAL CASEMENTS

PROJECTED CASEMENTS—OPEN OUT AND IN

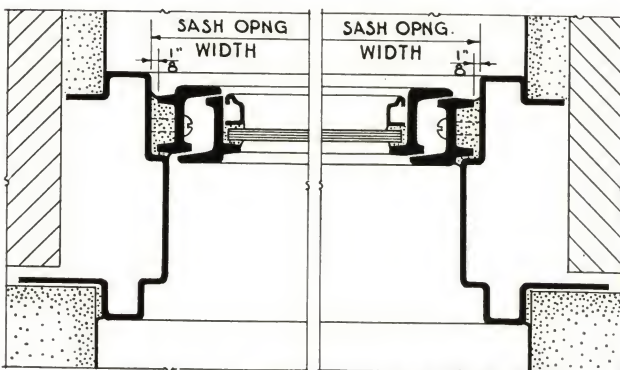
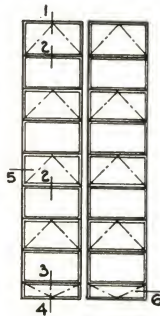


BANCA COMMERCIALE ITALIANA TRUST CO. - NEW YORK
HARRY R. ALLEN-ARCHT.



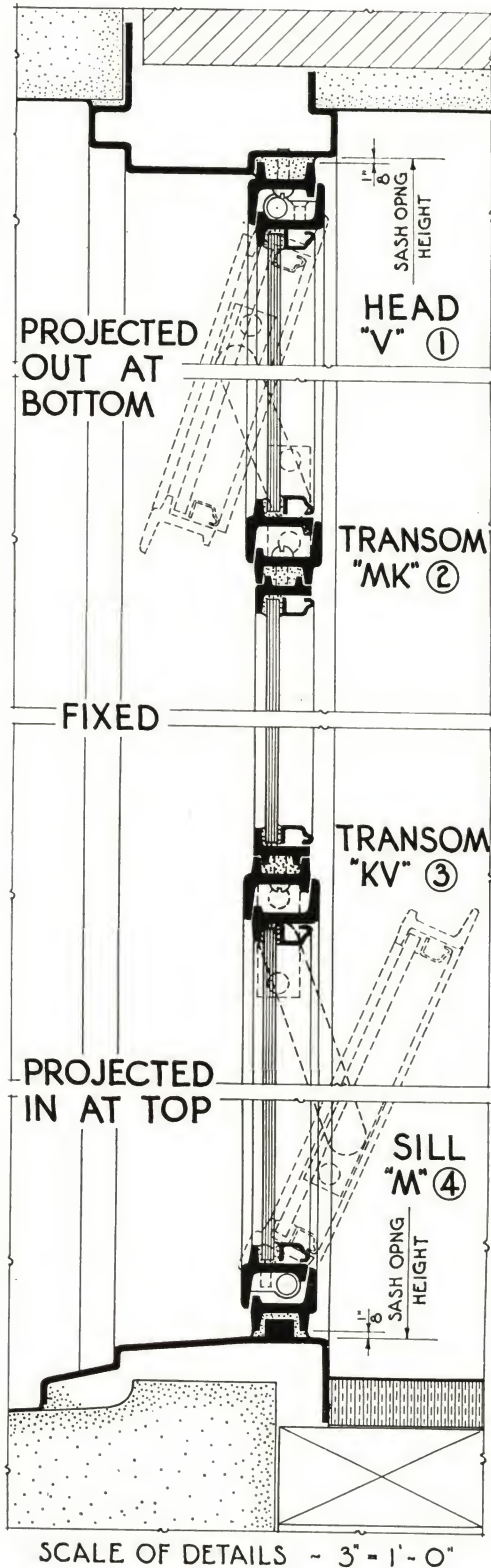
ALTERNATE TRANSOM
"BP" ③

HEAVY SECTION - SOLID BEAD



JAMB "L" ⑤
PROJECTED OUT

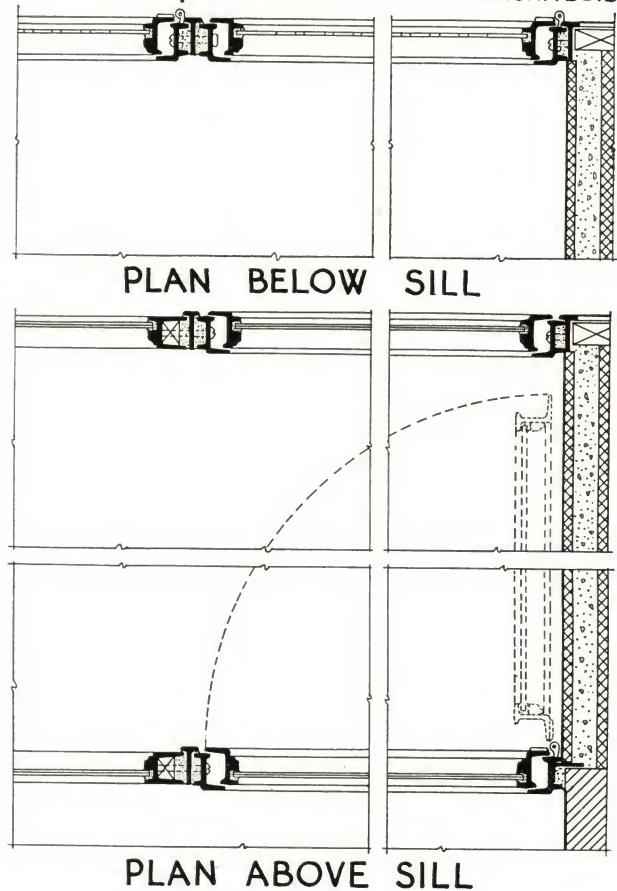
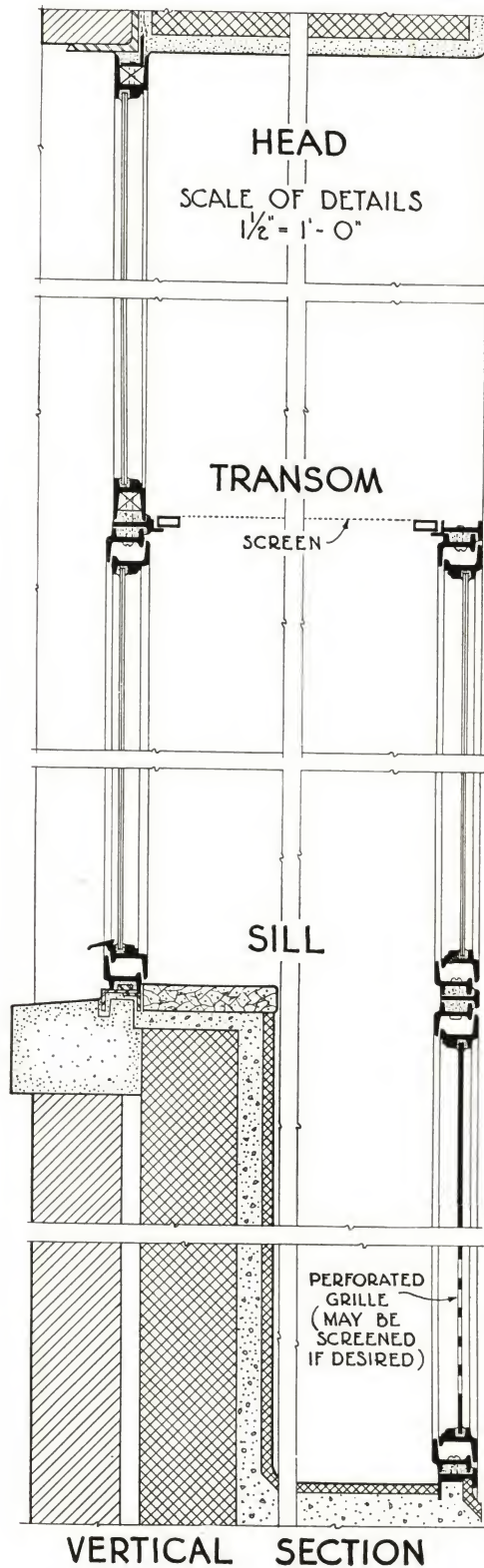
JAMB "V" ⑥
PROJECTED IN



SCALE OF DETAILS ~ 3'-1'-0"

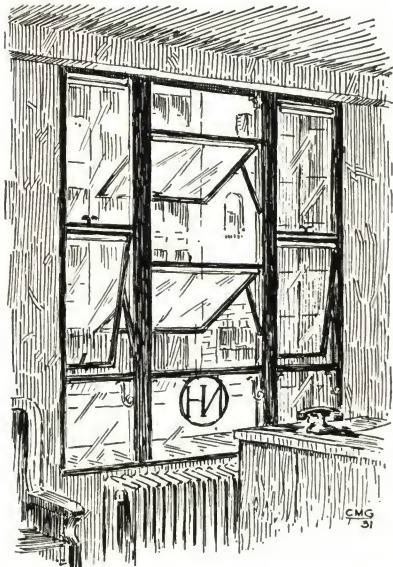
UNIVERSAL CASEMENTS

HOSPITAL OPERATING ROOM WINDOWS



UNIVERSAL CASEMENTS

REVERSIBLE WINDOWS

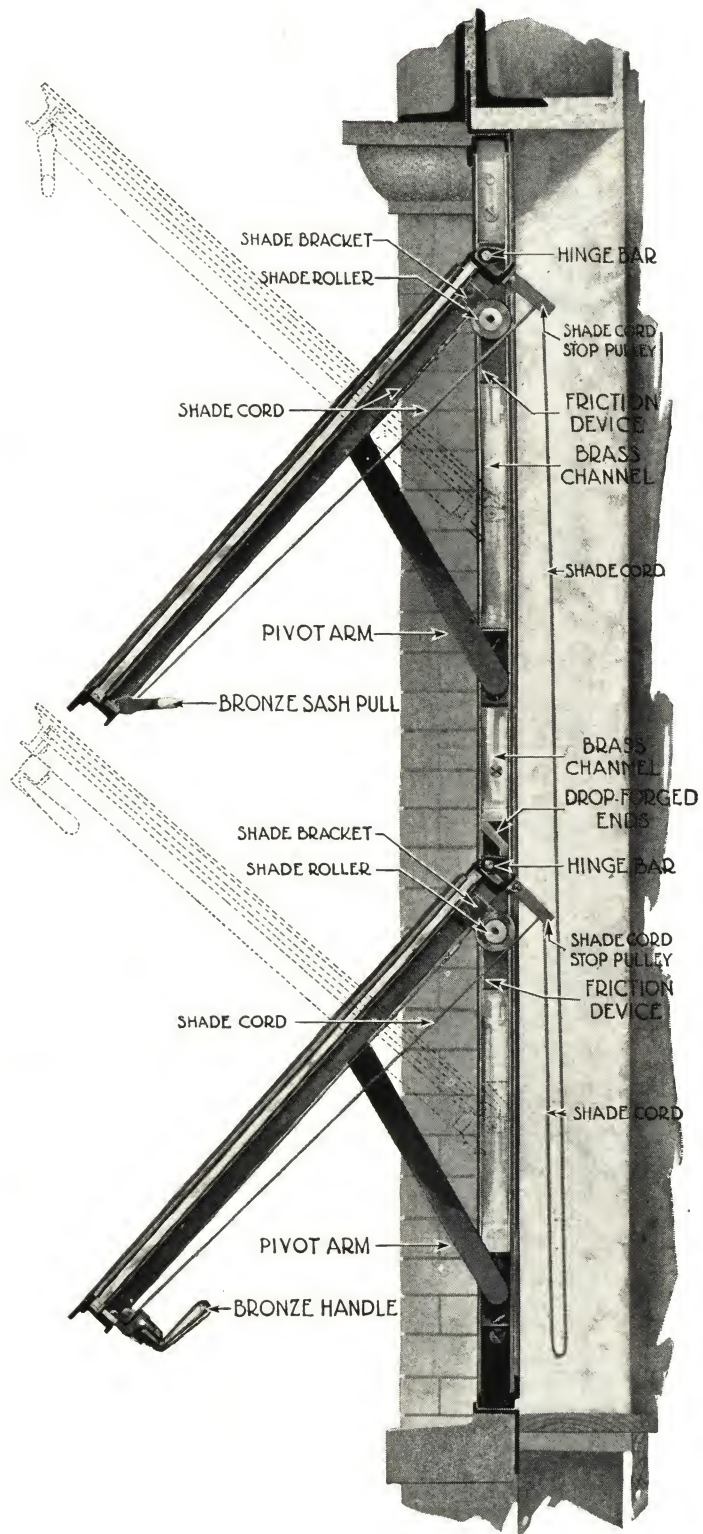
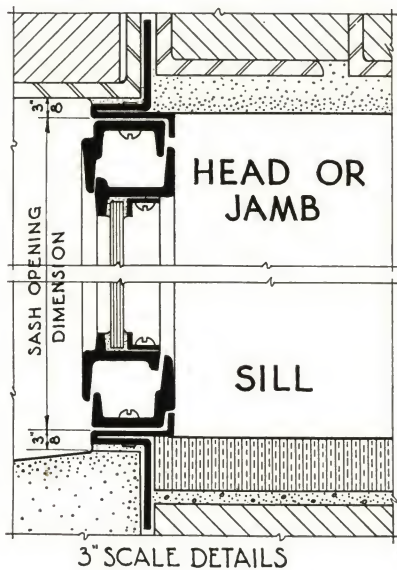


CITY HALL-UNIT N°1 - NEW HAVEN, CONN.
EGERTON SWARTWOUT - ARCHITECT.

FOR OFFICE BUILDINGS OR MONUMENTAL TYPE BUILDINGS OF MORE THAN USUAL DISTINCTION WHERE A WINDOW OF THE PROJECTED TYPE IS CONTEMPLATED THE REVERSIBLE WINDOW IS RECOMMENDED. RUGGED CONSTRUCTION, SIMPLICITY OF OPERATION, EASE OF CLEANING, AND PERFECTION OF DETAIL CHARACTERIZES THIS SASH.

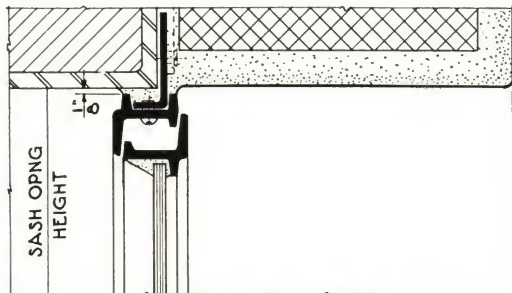
REVERSIBLE WINDOWS SHOULD BE INSTALLED IN SUB-FRAME CONSTRUCTION OF SIMILAR CONTOUR TO FRAMES USED FOR UNIVERSAL CASEMENTS.

THEY ARE SUPPLIED WITH UNDERWRITERS LABELS WHEN REQUIRED.

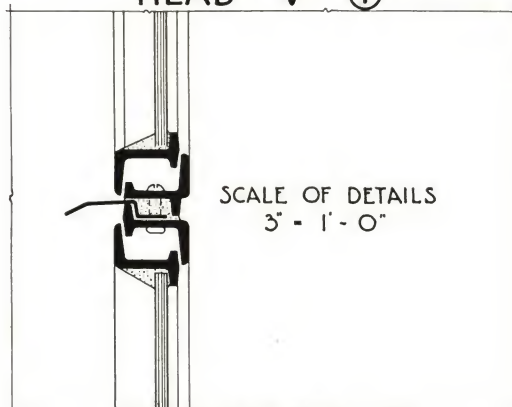


UNIVERSAL CASEMENTS

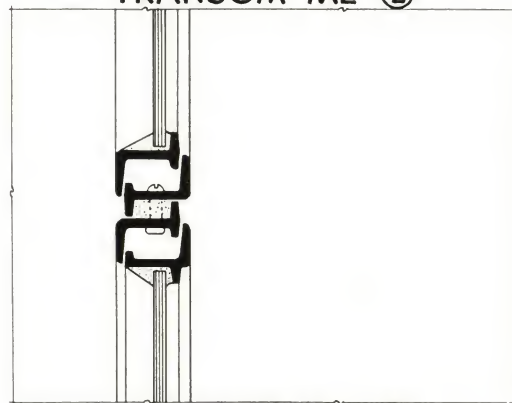
SUGGESTIONS FOR OFFICE WINDOWS & STEEL STOOL



HEAD "V" ①



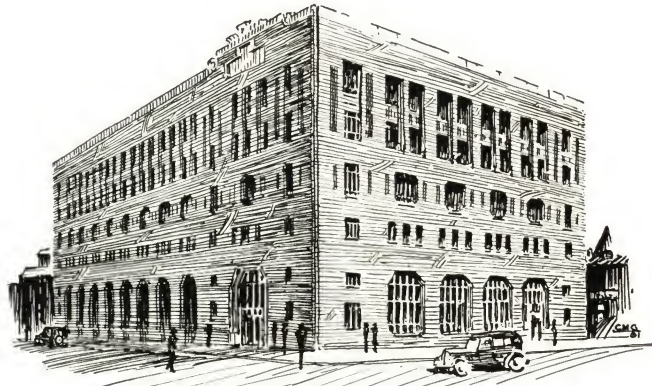
TRANSOM "ML" ②



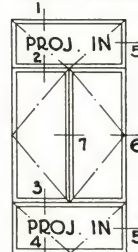
TRANSOM "MV" ③



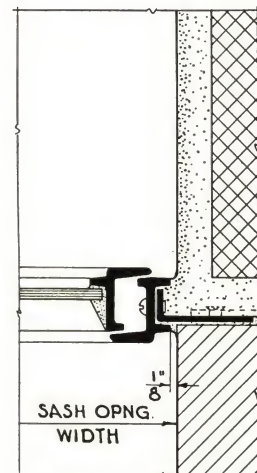
SILL "M" ④

GLOBE-DEMOCRAT BLDG.
ST. LOUIS, MO.MAURAN, RUSSELL & CROWELL
ARCHITECTS.

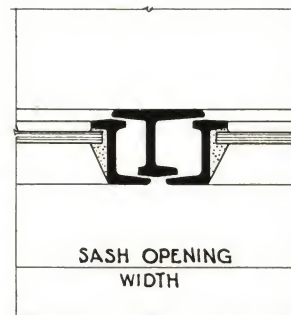
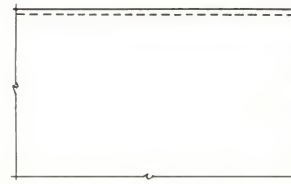
ELEVATION AND DETAILS ARE SUGGESTIONS FOR AN OFFICE BUILDING TYPE WINDOW. SIZES AND ARRANGEMENT OF VENTILATORS MAY VARY IN ACCORDANCE WITH THE ARCHITECT'S DESIGN. SPECIFICATIONS FOR UNIVERSAL CASEMENTS GOVERN MANUFACTURE OF THESE WINDOWS ~



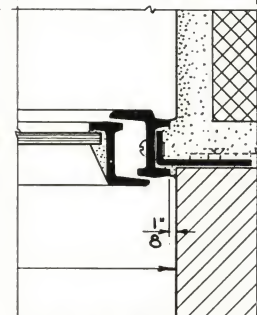
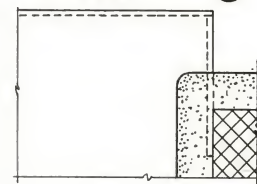
TYPICAL ELEVATION



JAMB "V" ⑤



MEETING RAIL "O" ⑦



JAMB "L" ⑥

UNIVERSAL CASEMENTS

UNIVERSAL CASEMENT DOOR HARDWARE



TOP BOLT



ATHENEUM BLDG., CALIFORNIA TECH.,
PASADENA, CALIF.

Gordon B. Kaufmann, Architect



BOTTOM BOLT



HANDLES AND
LOCK PLATE
(Outside View)

Cylinder locks should be specified when desired. Special mention should be made if they are to be master keyed. Dummy locks should also be specified when desired. Top and bottom bolts are furnished on all double doors. Door holders and friction adjusters are furnished only when specified.

A Cremorne Bolt Lock may be furnished, with the rods concealed in the section, operative from outside and inside, and with a thumb latch inside. Cylinders may be applied on the outside or both sides at extra cost.

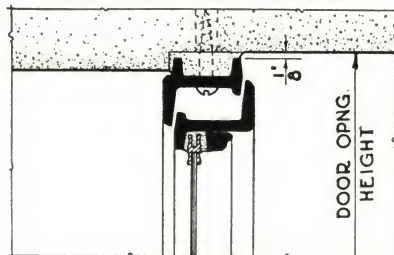


HANDLES AND
LOCK PLATE
(Inside View)

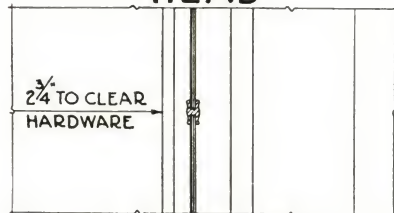
UNIVERSAL CASEMENTS

UNIVERSAL CASEMENT DOOR DETAILS

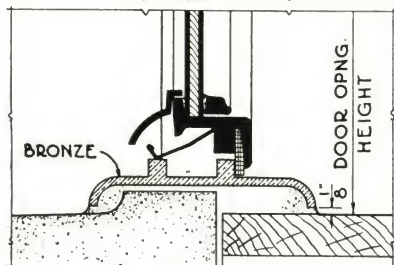
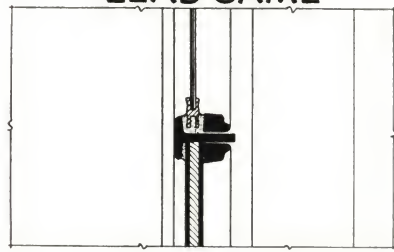
IN - OPENING



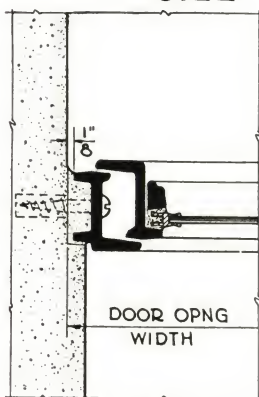
HEAD



LEAD CAME



SILL



JAMB

NOTES

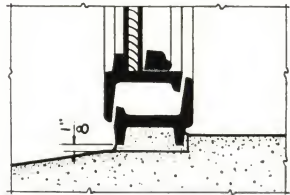
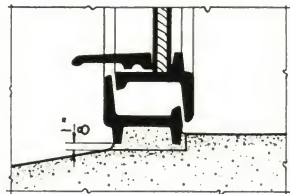
UNIVERSAL CASEMENT DOORS ARE MANUFACTURED IN ACCORDANCE WITH ARCHITECTS' DESIGNS AND SIZES.

SINGLE LEAF DOORS SHOULD NOT EXCEED 3'-0" IN WIDTH DOUBLE LEAF DOORS SHOULD NOT EXCEED 6'-0" IN WIDTH HEIGHTS SHOULD NOT EXCEED 8'-0"

TO PREVENT GLASS BREAKAGE LOCKS MUST ALWAYS BE FRAMED BY STEEL MUNTINS OR LEAD CAMES GLASS SHOULD NEVER BE CUT OUT TO FIT AROUND THE LOCK

HEIGHT OF THE LOCK FROM THE FLOOR MAY VARY TO PERMIT BETTER PANE ARRANGEMENT.

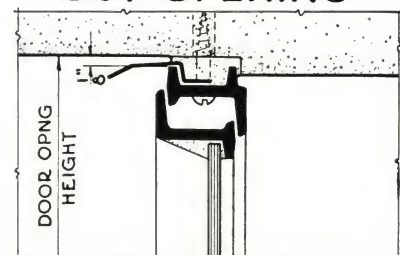
HEIGHT OF THE KICK PLATE MAY ALSO VARY, BUT DOORS OF MAXIMUM SIZE, OR CLOSE TO MAXIMUM SIZE REQUIRE A KICK PLATE NOT LESS THAN 9" HIGH



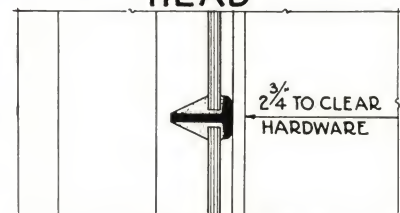
ALTERNATE SILLS

FOR USE WHERE PASSAGE THROUGH DOORS IS INFREQUENT I.E. ON BALCONIES ETC

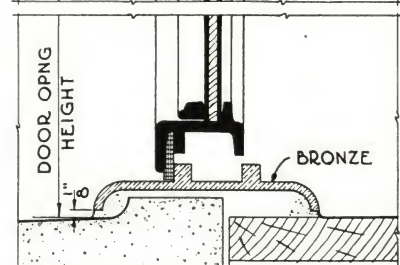
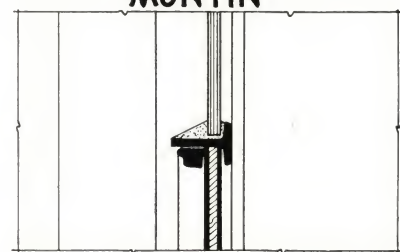
OUT-OPENING



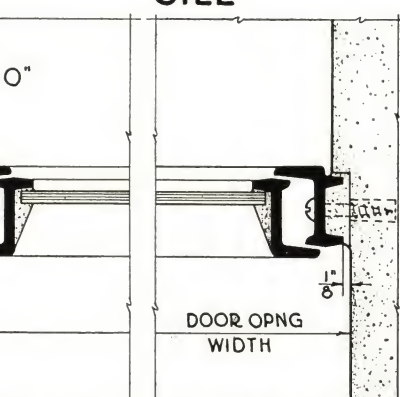
HEAD



MUNTIN

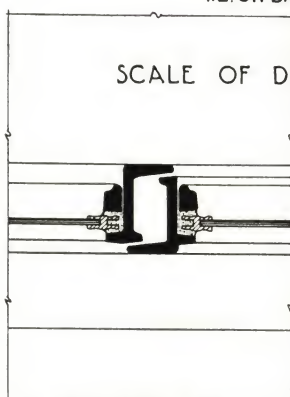


SILL

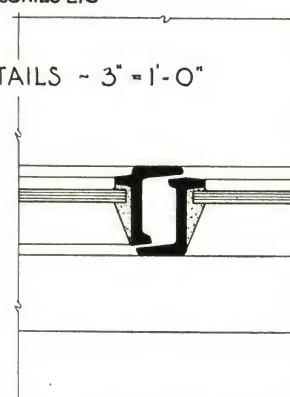


JAMB

SCALE OF DETAILS ~ 3" = 1'-0"



MEETING RAIL



MEETING RAIL

UNIVERSAL CASEMENTS

MECHANICAL OPERATORS



FEDERAL RESERVE BANK, RICHMOND, VA.
Carneal and Johnston, Architects

Crittall Rod Gearing

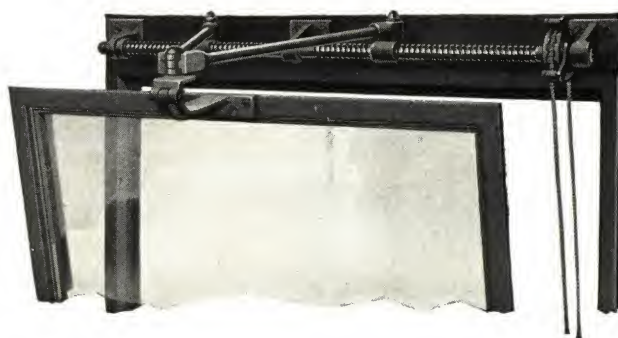
Rod gearing is designed to operate a number of transoms (preferably not over four) from one station. It may be used on any type of ventilating transom except side hinged. The arms and horizontal rods are painted iron. The down rod may be either iron or polished bronze as specified. The gear box and handle are always bronze. Supplied only when specified.



Crittall Rack Openers

Substantially made of solid bronze, this fitting is for the operation of individual transom units where the projecting arm is not objectionable. It is used on either bottom hinged in-opening or top hinged out-opening transoms.

It is supplied only when specified.



Crittall Duplex Gearing

This fitting is for use on either bottom hinged in-opening or top hinged out-opening transoms, operating single units only.

Supplied only when specified.

UNIVERSAL CASEMENTS

BRONZE CASEMENTS



Below:
JOSEPH E. WIDENER RESIDENCE,
WEST PALM BEACH, FLA.
Trenor & Fatio,
Architects

Below:
FOREST LAWN MAUSOLEUM,
GLENDALE, CALIF.
Forest Lawn Arch'l Dept.,
Architects



ALVAN MACAULEY
RESIDENCE,
GROSSE POINTE
SHORES, MICH.
Albert Kahn
Inc., Archi-
tects



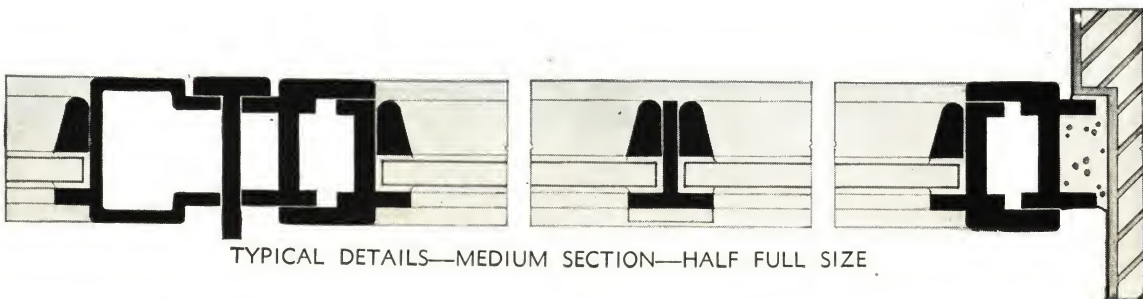
TYPICAL
INSTALLATIONS

Bronze Universal Casements are constructed of extruded sections of the same design as used for steel medium and heavy weight Universal Casements, but slightly heavier in cross sectional area to compensate for the difference in the natural strength of the two metals. Fixed light sections are formed to the same contour as the combined casement sections as illustrated below, giving uniformity of appearance to the stationary and ventilating units in a composite opening.

Hardware is the same as for steel Universal Casements, except that the bronze butts have terminal

ends to the phosphor bronze pins to add a touch of refinement to the general appearance of the window.

The finish required should be definitely specified. Generally these casements are furnished in natural finish, as the weather quickly tones them and gives them a much desired appearance of age that cannot be duplicated by artificial treatment. However, they can be finished a dark coinage color to match the hardware at extra cost. These finishes should be applied after installation; otherwise, they will be damaged before occupancy.



TYPICAL DETAILS—MEDIUM SECTION—HALF FULL SIZE

NORMAN CASEMENTS



WELLESLEY COLLEGE ADMINISTRATION BUILDING, WELLESLEY, MASS.

Charles Z. Klauder, Architect

NORMAN CASEMENTS

CRITTALL CASEMENT WINDOW COMPANY

DETROIT, MICHIGAN

NORMAN Casements are heavy standard windows, available in both out-opening and in-opening types in a complete range of sizes, combinations and shapes, and are adaptable to use in any type of building. They were created as a standardization of the Crittall Universal Casement, a custom built window, and possess the same characteristics of design and workmanship as does this justly famous window.

The high standards of material and workmanship incorporated in these casements enables this Company to guarantee unquestionably that they will be wind and watertight, without weatherstrips of any kind. To add to their appearance of quality, they are equipped with excellently designed and durable hardware.

Particularly for use in residence work, the Norman Screened Casement may be furnished to provide a detachable flat screen designed as an

integral part of the window. Special hardware permits complete operation of the window without moving the screen.

Norman Casements, of the screened or non-screen type, may also be furnished in special sizes at slight extra cost, providing the construction and fittings remain standard, and sizes do not exceed 2 ft. 6 in. wide and 6 ft. 0 in. high.



The Norman Casement Door is made as a double door of sturdy construction in a single standard size. It is designed to open out or in, and embodies the same characteristics of construction and appearance as does the

Norman Casement.

The advantages of the Norman Casement line are immediately evident as quality to please the most exacting, coupled with the economy made possible by standardization of a high grade product.

SPECIFICATIONS

Windows—All windows shall be Crittall Norman Casements as manufactured by the CRITTALL CASEMENT WINDOW COMPANY, Detroit, Michigan. All windows shall be standard sizes and types as shown on architect's drawings. Shop drawings must be submitted for the architect's approval. Casements shall be furnished complete with standard solid bronze hardware, finished in dark coinage color. Steel sections, including ventilating section and frame, but not including glass stops or sub-frames, shall weigh not less than 3.25 lbs. per lineal foot.

The casements shall be installed by the manufacturer. (If this is impractical, they can be set by local labor but care should be exercised to see that they are erected according to the manufacturer's instructions.) All joints between the steel sash and the collateral construction are to be made tight with the use of Crittall Mastic Cement neatly pointed on the exterior.

Screened Casements

Specifications for Norman Casements are to be followed for Norman Screened Casements with the following additions:

All casements shall be prepared with two anchor buttons, located on the jambs near the top to receive flat steel (bronze, if desired) frame screens, which are also included in this

contract. These screens shall have 16-mesh (18-mesh, if desired) antique bronze wire cloth. Screen frames shall be painted to match the casements. (If bronze, finish to be statuary.)

Screens shall be installed under another heading. (The original installation of screens should be included in the general or carpenter's contract, as they would be damaged if installed at the time of erection of casements, and due to being especially designed for simplicity of attachment and removal, do not require the services of skilled casement workmen.)

Extras To Be Included If Desired

The casements are to set directly into prepared masonry openings, and the manufacturer shall supply continuous angle fin around the head and jambs of all openings for making a perfect joint between sash and masonry. (If casements are set in Utility or Hollow Metal Frames, specify these to be furnished under the casement contract and to be built in by the mason contractor.)

Norman Casements are made with spring clips for putty glazing from the outside. If glass stops are required, a steel angle stop may be specified, applied only on the outside and set with round head bronze screws.

NORMAN CASEMENTS

STANDARD HARDWARE

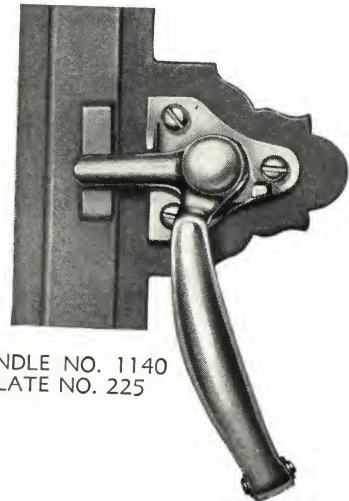


FRICTION STAY
(Supplied when specified)

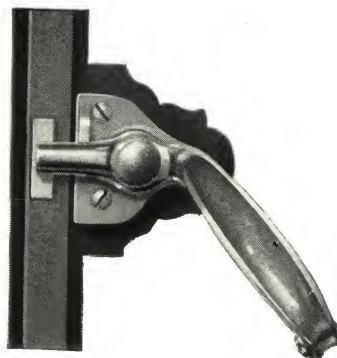
Standard hardware on Norman Casements is Handle No. 1006 or No. 1140, and friction hinges. When specified, non-friction hinges may be supplied with friction stay applied at the head of the casement. Handle No. 1270 and Operator No. 1275 are standard for all Norman Screened Casements. All handles may be furnished with two throw latches when casements are 5 ft. 0 in. high or over, or when the casement is so located that a single handle would be out of reach.



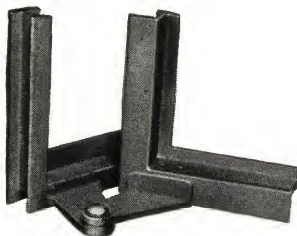
SCREENED CASEMENT
HANDLE NO. 1270



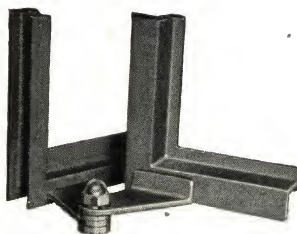
HANDLE NO. 1140
PLATE NO. 225



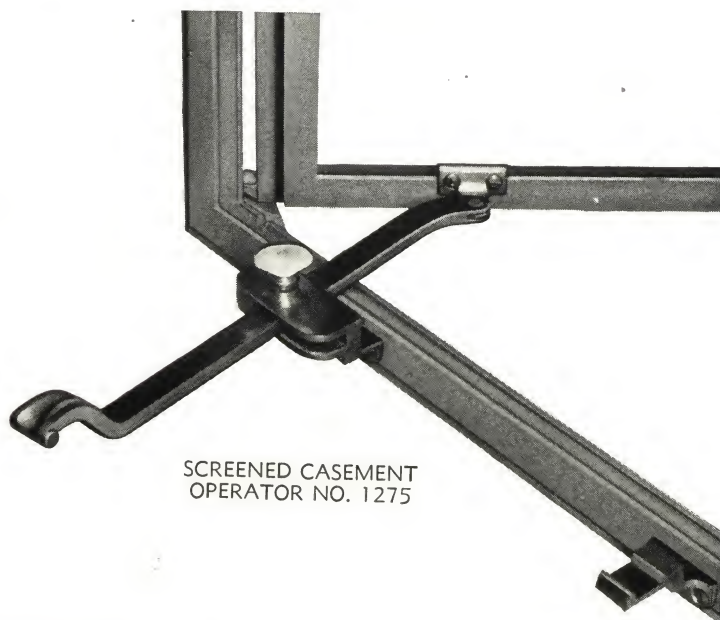
At Left:
HANDLE NO. 1006
PLATE NO. 225



NON-FRICTION HINGE



FRICTION HINGE



SCREENED CASEMENT
OPERATOR NO. 1275

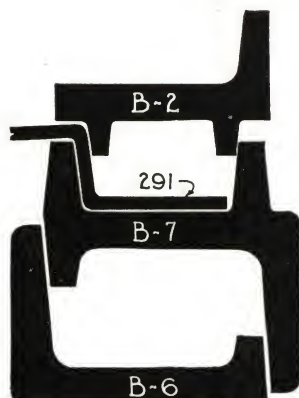
NORMAN CASEMENTS

FULL SIZE SECTIONS



HEAD-JAMB
OR SILL

(F)
FIXED



TRANSOM
BAR (G)

OPEN OUT-FIXED TRANSOM
(COMBINATION SHOWN - "GA")



JAMB (C)
OPEN OUT

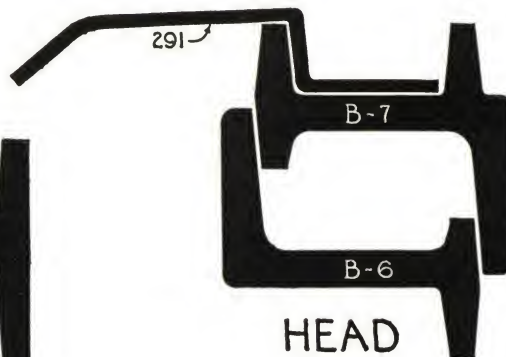


TRANSOM
BAR (H)

OPEN OUT-FIXED TRANSOM
(COMBINATION SHOWN - "FHA")



ANGLE FIN (L)



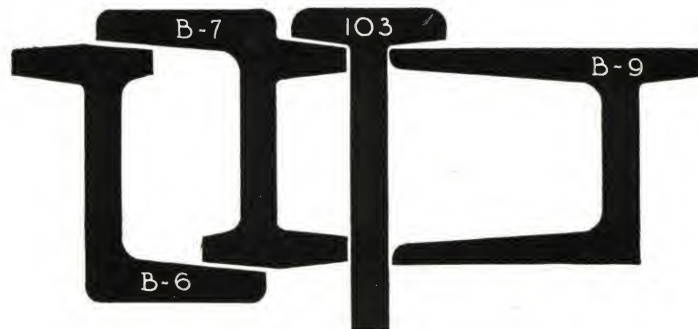
HEAD
(A)
OPEN OUT



MUNTIN
(E)



SILL (B)
OPEN OUT



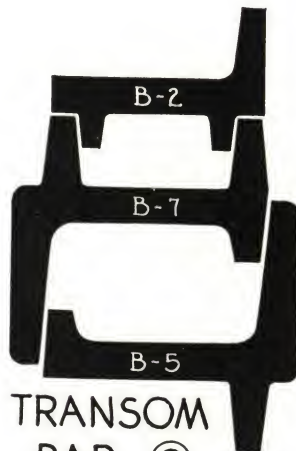
MULLION (D)
OPEN OUT - (COMBINATION SHOWN - "CDF")

NORMAN CASEMENTS

FULL SIZE SECTIONS

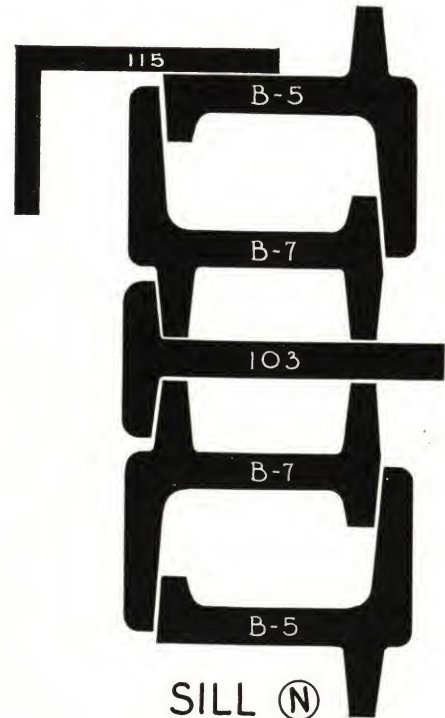


HEAD OR
JAMB ①
OPEN IN

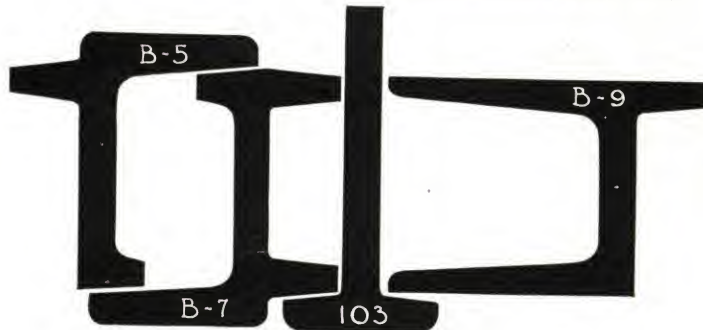


TRANSOM
BAR ②

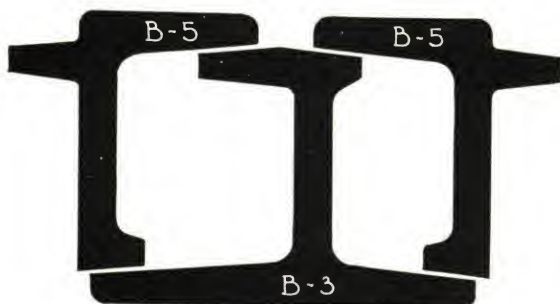
OPEN IN - FIXED TRANSOM
(COMBINATION SHOWN - "GJ")



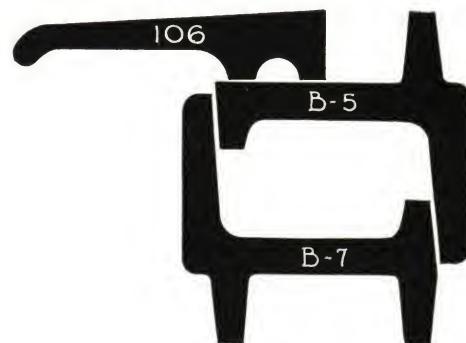
SILL ③
(BOTTOM HINGED)
OVER TRANSOM
BAR ④
OPEN IN
(COMBINATION SHOWN - "NDJ")



MULLION ⑤
OPEN IN - (COMBINATION SHOWN "JDF")



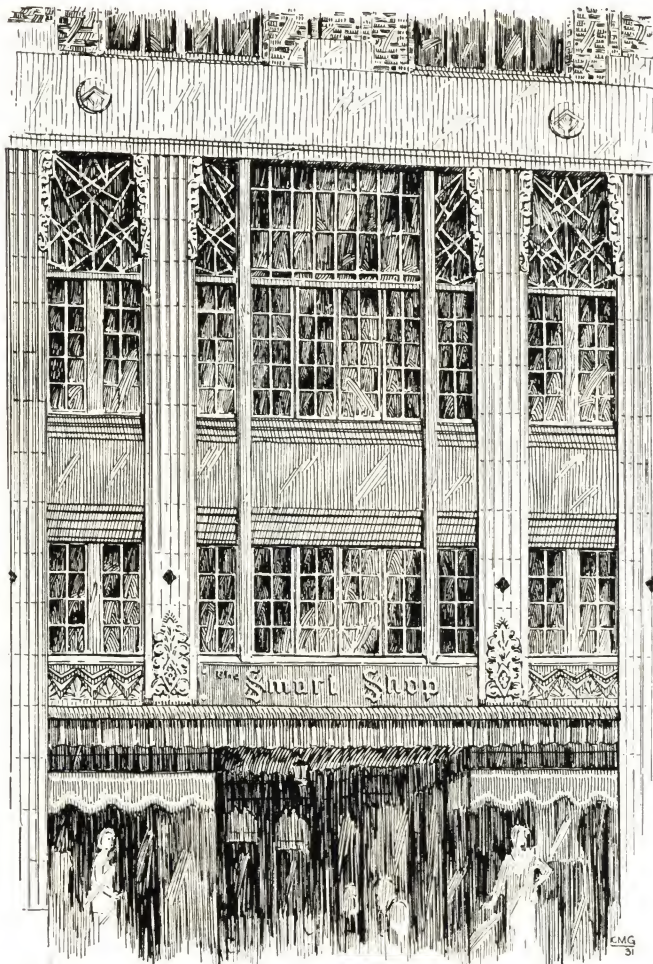
MEETING RAIL ⑥
OPEN IN OR OPEN OUT
(OPEN IN SHOWN)



SILL ⑦
OPEN IN

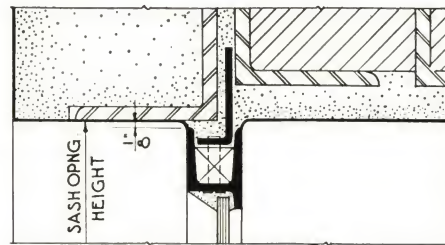
NORMAN CASEMENTS

SIDE HINGED—OPEN OUT—FIXED TRANSOM

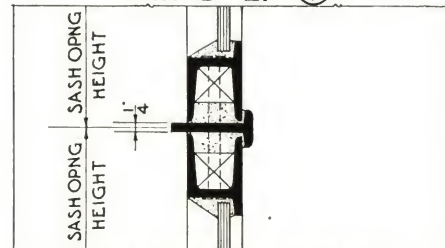


FINNEGAN BUILDING
HOUSTON, TEXAS

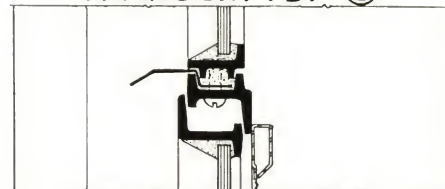
ALFRED C. FINN
ARCHITECT



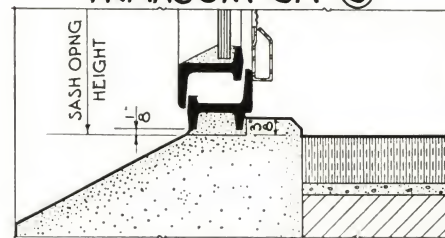
HEAD "LF" ①



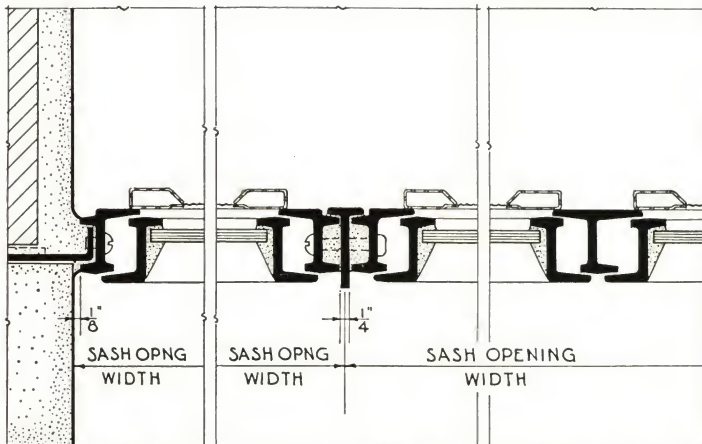
TRANSOM "FDF" ②



TRANSOM "GA" ③

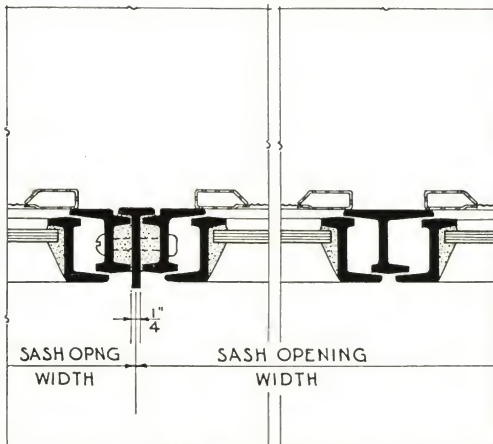


SILL "B" ④



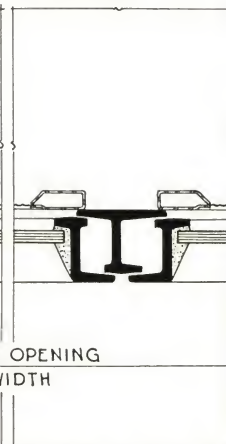
JAMB "LC"

⑤



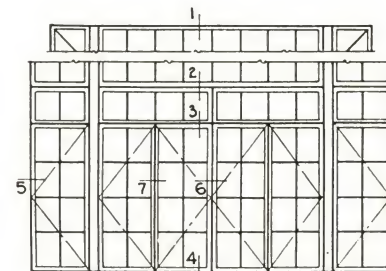
MULLION "CDC"

⑥



MEETING RAIL "M"

⑦



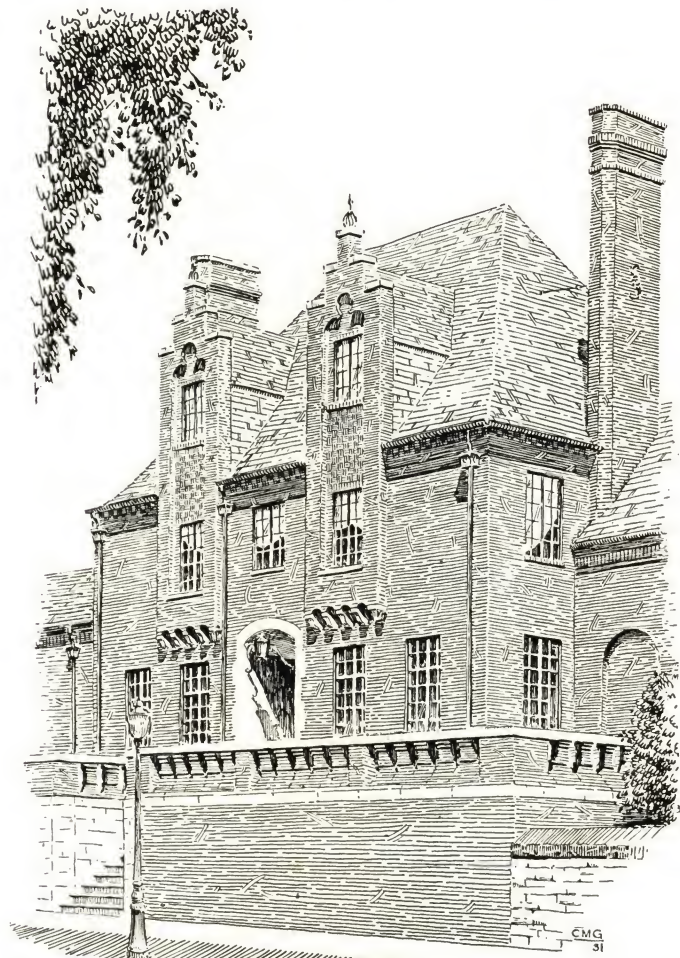
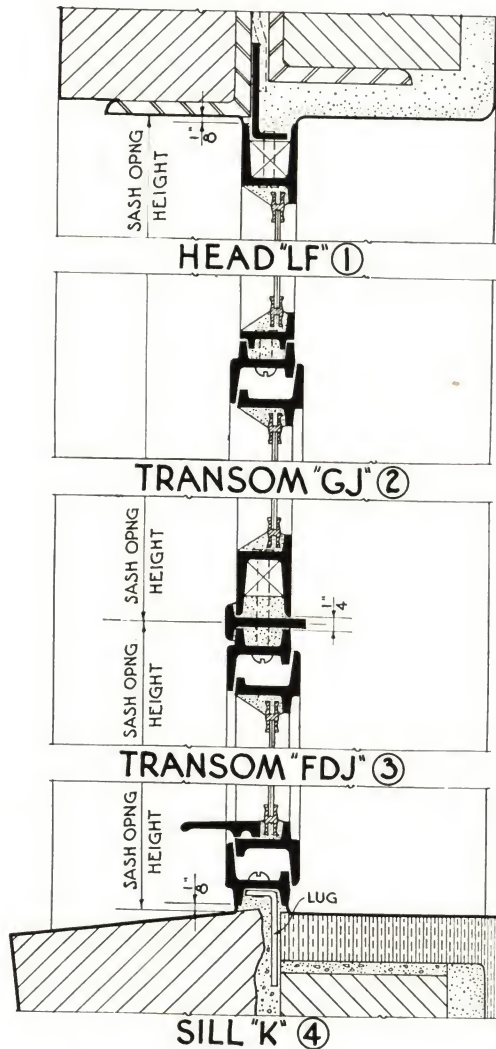
ELEVATION

NOTE: SECTION LETTERS REFER TO MARKING OF FULL SIZE SECTIONS FOR NORMAN CASEMENTS. NUMBERS REFER TO ELEVATION SHOWN ABOVE.

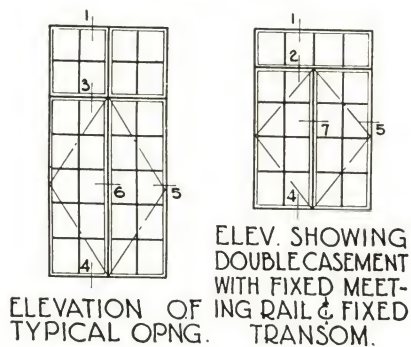
SCALE OF DETAILS ~ 3" = 1'-0"

NORMAN CASEMENTS

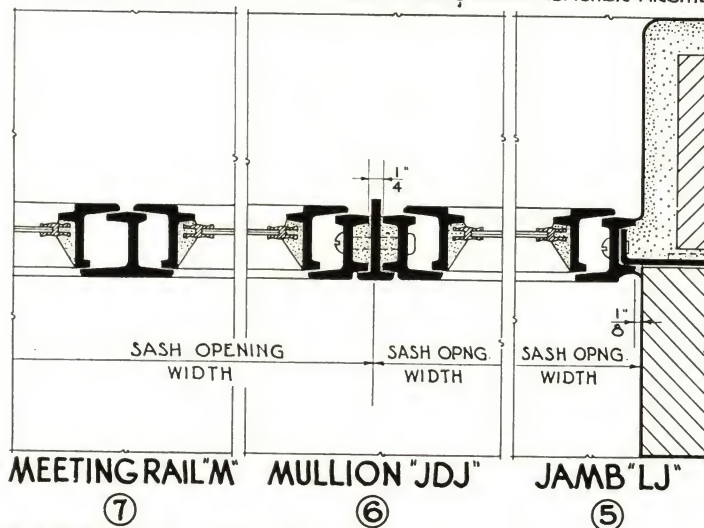
SIDE HINGED—OPEN IN—FIXED TRANSOM



SCHOOL OF DOMESTIC ARTS & SCIENCE - THE MODEL HOUSE UNIT
CHICAGO, ILL. GRANGER & BOLLENBACHER-ARCHTS



NOTE: SECTION LETTERS REFER TO MARKING OF FULL SIZE SECTIONS FOR NORMAN CASEMENTS. NUMBERS REFER TO ELEVATIONS SHOWN ABOVE.



SCALE OF DETAILS ~ 3" = 1'-0"

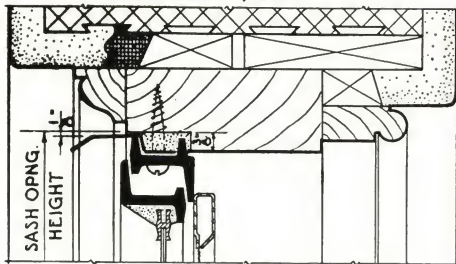
NORMAN CASEMENTS

SIDE HINGED—OPEN OUT—TOP HINGED TRANSOM

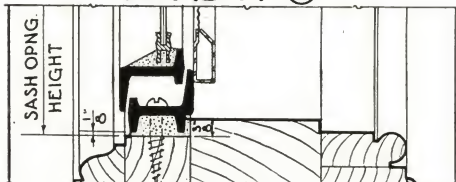


CHARLES H. SCHNEPPE RES.
BALTIMORE, MD.

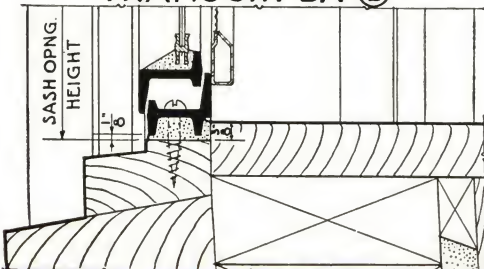
PALMER, WILLIS & LAMBIN
ARCHITECTS



HEAD "A" ①

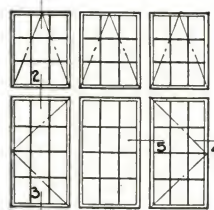


TRANSOM "BA" ②

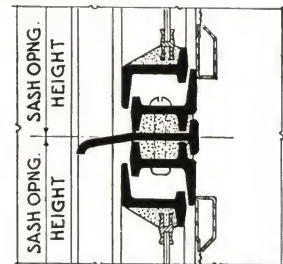


SILL "B" ③

SCALE OF DETAILS
3" = 1'-0"

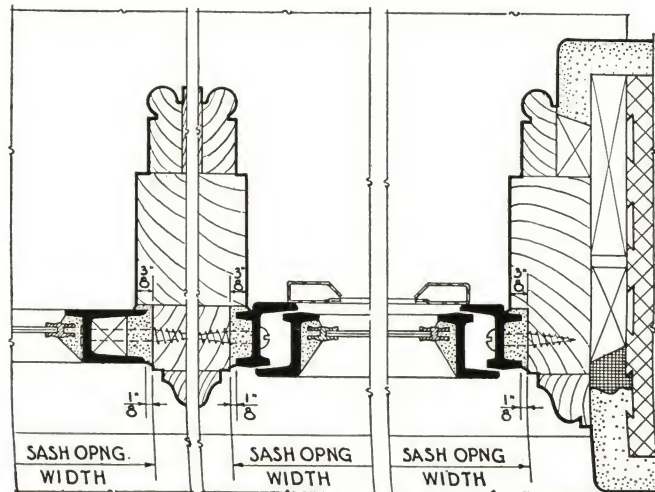


ELEVATION

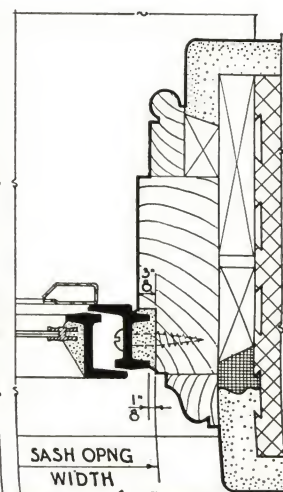


TRANSOM "BHA" ②
(ALTERNATE IN STEEL)

NOTE: SECTION LETTERS
REFER TO MARKING OF
FULL SIZE SECTIONS FOR
NORMAN CASEMENTS ~



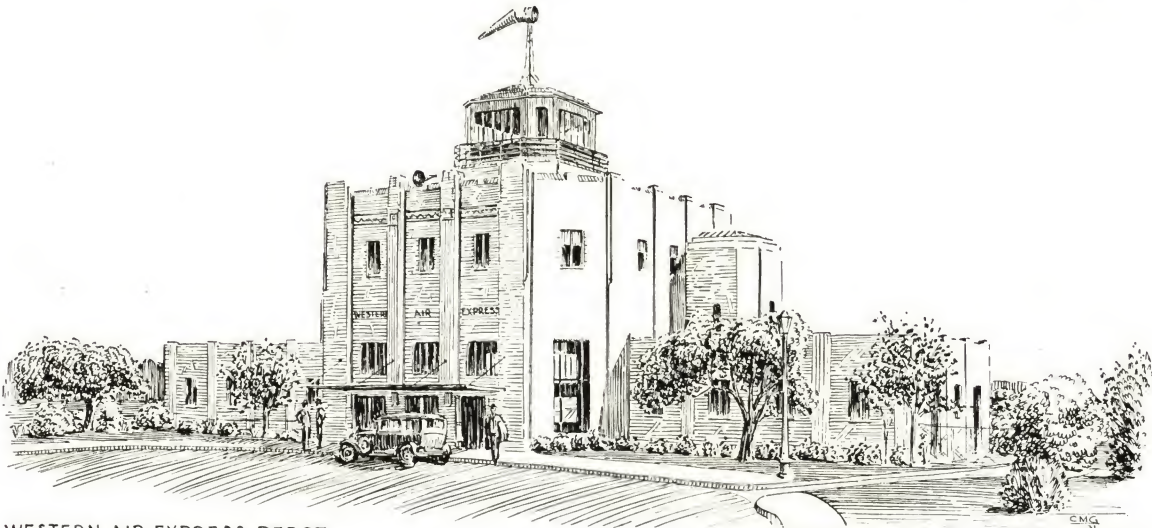
MULLION "FC" ⑤



JAMB "C" ④

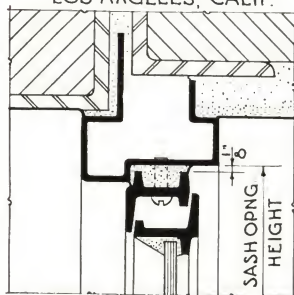
NORMAN CASEMENTS

OPEN IN—BOTTOM HINGED TRANSOM—SUB-FRAMES



WESTERN AIR EXPRESS DEPOT
LOS ANGELES, CALIF.

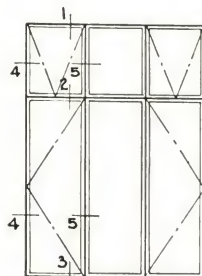
A M EDELMAN AND A C ZIMMERMAN
ASSOCIATED ARCHITECTS



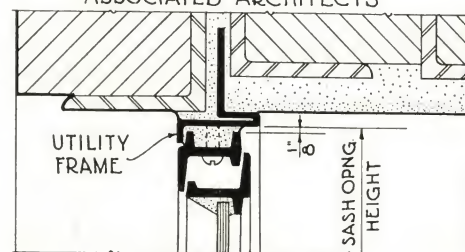
ALTERNATE DETAIL
(HOLLOW METAL FRAME)

NOTE : SECTION LETTERS
REFER TO MARKING OF
FULL SIZE SECTIONS FOR
NORMAN CASEMENTS -

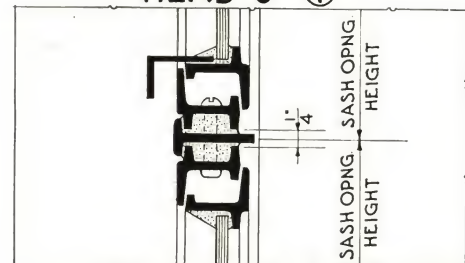
SCALE OF DETAILS
3" = 1'-0"



ELEVATION



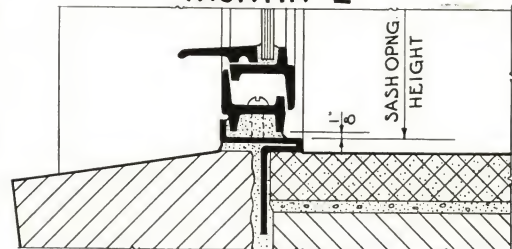
HEAD "J" ①



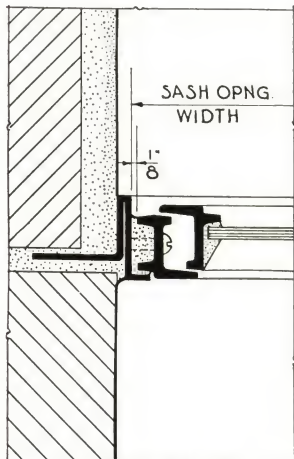
TRANSOM "NDJ" ②



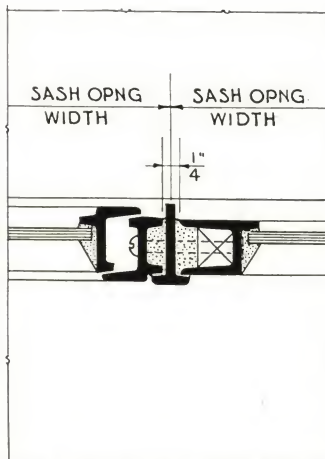
MUNTIN "E"



SILL "K" ③



JAMB "J" ④



MULLION "JDF" ⑤

NORMAN SCREENED CASEMENTS



THE Norman Screened Casement is the result of careful study and experimentation, directed toward producing a compact unit, combining beauty and utility. The screen is available in either steel or bronze with antique bronze cloth. The rigid frame lies perfectly flat against the casement and, having a beveled return to the screen cloth, does not provide a ledge for dust. It is held securely on the casement by the hardware brackets at the bottom, and by two anchor buttons near the top. Complete operation of the casement—opening, closing, and locking—is accomplished without moving the screen. For cleaning windows or storage purposes, the screen is quickly removed and readily replaced.

The very simplicity that gives easy operation contributes to the attractiveness of the solid bronze fittings, which were created to conform with the generally accepted design of casement hardware. The fitting at the sill not only serves to operate the window, but also holds it open in any desired position by thumb screw adjustment; and, in addition, by engaging it in the bracket rest when the window is closed, the casement is effectually locked. A handle of pleasing appearance, engaging in a beveled strike plate, pulls the sections snugly together, insuring perfect wind and weather tightness.

Operators are completely of bronze and have no mechanical parts that will loosen with normal usage. They are designed for attaching to the frame without cutting away the sections and risking air infiltration.



OPERATOR FOR
SIDE HINGED CASEMENT



AT RIGHT:
HANDLE

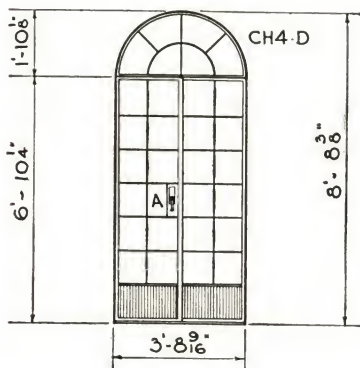
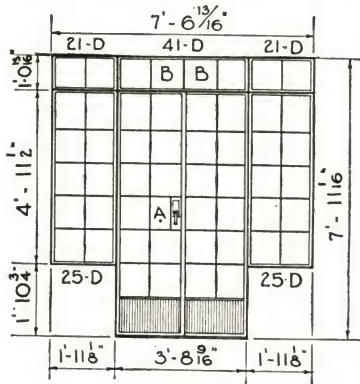


OPERATOR BAR FOR
HAND OPERATION ONLY

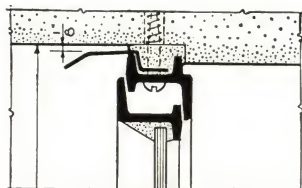
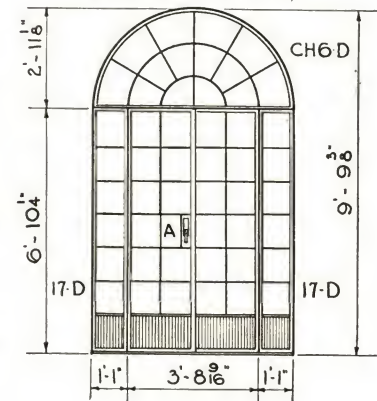
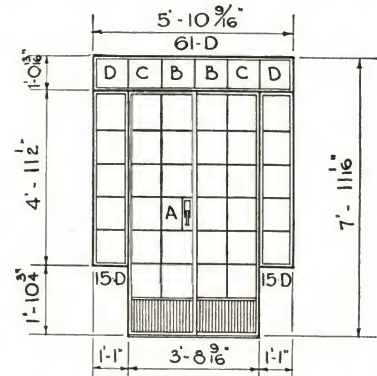


OPERATOR FOR
TOP HINGED CASEMENT
(With ring for pole operation, or may also be
operated by hand)

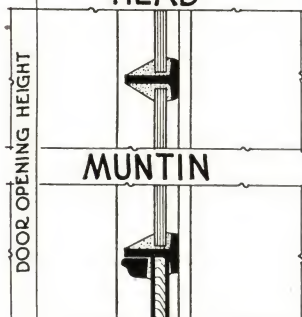
STANDARD CASEMENT DOOR SIDELIGHTS & TRANSOMS OF NORMAN FIXED SECTION



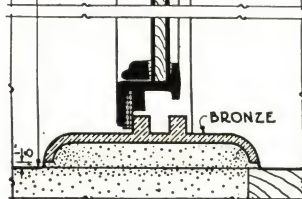
DOOR OPENING DIM.-3'-8 9/16" x 6'-10 1/4"



HEAD

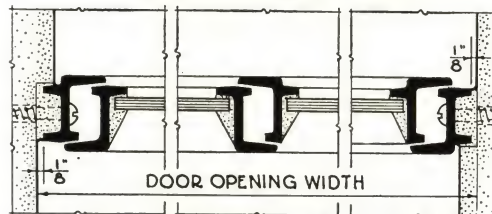


MUNTIN

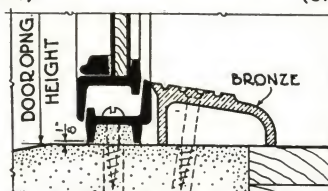
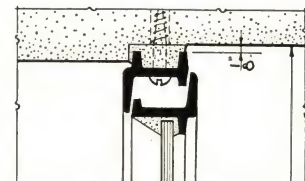
SILL
OPEN OUT

STANDARD DOORS ARE FIT- ON OUTSIDE, OR BOTH OUT-
TED WITH STEEL T MUNTINS. SIDE AND INSIDE, ARE FUR-
NISHED AT AN EXTRA
SOLID BRONZE THRESHOLDS. ENCLOSED TOP & BOTTOM
BOLTS, STEEL KICK PLATES, AND SOLID BRONZE HAND-
LES. A BRONZE THUMB- GLASS SIZES
TURN ON THE INSIDE IS UNLESS OTHERWISE NOTED
FURNISHED FOR LOCKING ALL LIGHTS ARE 9 7/8" x 11"
PURPOSES. CYLINDER LOCKS A-6 3/4" x 11" C-11 5/16" x 11"
CIRCULAR - SEE TEMPLATES. B-10 7/8" x 11" D-11 1/4" x 11"

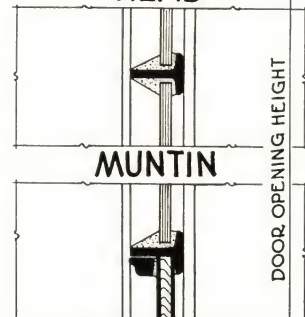
SCALE OF DETAILS - 3" = 1'-0"



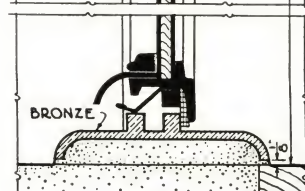
JAMB (OPEN OUT) MEETING RAIL JAMB (OPEN IN)

ALTERNATE SILL
HALF THRESHOLD - MAY BE USED
ON BOTH OPEN OUT AND IN DOORS

HEAD



MUNTIN

SILL
OPEN IN

STANWIN CASEMENTS



KENT SCHOOL DORMITORY,
KENT, CONN.

Shreve, Lamb & Harmon,
Architects



RESIDENCE AT FOX MEADOWS,
SCARSDALE, N. Y.

Lorillard Wise, Architect



BARBIZON PLAZA HOTEL,
NEW YORK, N. Y.

Laurence Emmons,
Architect

Below:

DR. LEONARD JOHNSON RESIDENCE,
ENGLEWOOD, N. J.

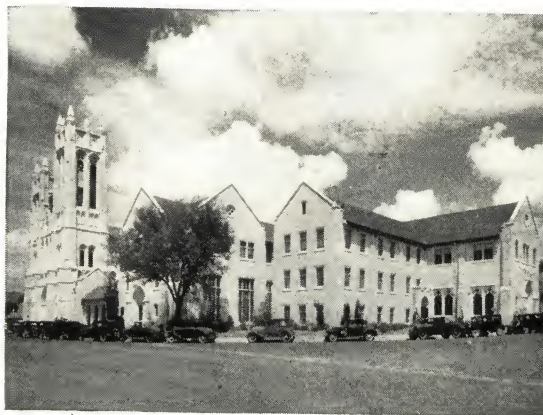
Polhemus & Coffin, Architects



Below:

FIRST M. E. CHURCH, SOUTH,
FORT WORTH, TEX.

W. C. Clarkson & Co., Architects



STANWIN CASEMENTS

CRITTALL CASEMENT WINDOW COMPANY

DETROIT, MICHIGAN

THE Stanwin Casement is a standard light weight window which is stocked in a complete range of types and sizes, and is most suitable for use in residences, apartment houses, hotels, institutional type buildings and similar structures.

The Stanwin Casement, though of lighter section than the Universal and Norman Windows, maintains the same thoroughness in manufacture and careful inspection as do these other products of Crittall. They will be found suitable in every respect to meet the most exacting weather conditions, as well as to present an excellent appearance.

Where screens are necessary the Stanwin

Screened Casement is recommended. This provides a detachable flat screen designed as an integral part of the window. Specially designed hardware permits complete operation of the casement without moving the screen.

Due to the inadequacy of light weight sections for door construction, the Crittall Standard door, using medium weight section is used in conjunction with Stanwin installations. These may open out or open in. Side lights and transoms are also made of medium section.

Stocks of Stanwin Casements and Doors in standard types and sizes are held at principal distributing centers, insuring prompt delivery.



SPECIFICATIONS

Windows—All windows shall be Crittall Stanwin Casements as manufactured by the CRITTALL CASEMENT WINDOW COMPANY, Detroit, Michigan. All windows shall be standard sizes and types as shown on architect's drawings. Casements shall be furnished complete with malleable iron handles and sill adjusters with bronze slide bars. Friction hinges may be substituted for sill adjusters. Steel sections, including ventilating section and frame shall weigh not less than 2.0 lbs. per lineal foot. Casements shall receive one coat of primer before shipment.

The casements shall be installed by the manufacturer. (If this is impractical they can be set by local labor but care should be exercised to see that they are erected according to the manufacturer's instructions.) All joints between the steel sash and the collateral construction are to be made tight with the use of Crittall Mastic Cement neatly pointed on the exterior.

Screened Casements

Specifications for Stanwin Casements are to be followed for Stanwin Screened Casements with the following changes:

Hardware shall be standard die cast handles and sill operators with dull black finish, designed to operate the casements without moving the screens.

Casements shall be suitably prepared to receive flat

steel (bronze, if desired) frame screens, which are also included in this contract. These screens shall have 16-mesh (18-mesh, if desired) antique bronze wire cloth. Screen frames shall be painted to match the casements. (If bronze, finish to be statuary.)

Screens shall be installed under another heading. (The original installation of screens should be included in the general or carpenter's contract, as they would be damaged if installed at the time of erection of casements, and due to being especially designed for simplicity of attachment and removal, do not require the services of skilled casement workmen.)

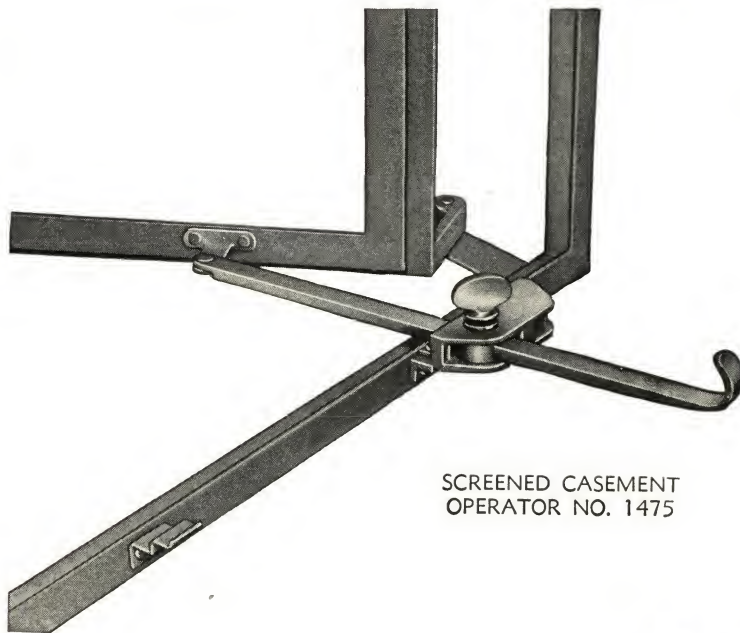
Extras to Be Included if Desired

The casements are to set directly into prepared masonry openings, and the manufacturer shall supply continuous angle fin around the head and jambs of all openings for making a perfect joint between sash and masonry.

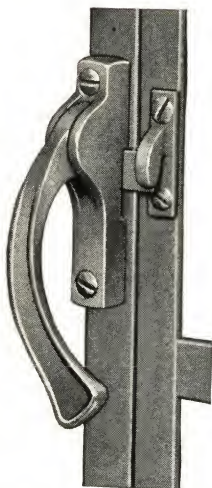
The manufacturer shall supply wood surrounds of Clear Heart Redwood, kiln dried, for all openings. These shall be cut to exact length to fit casements, and shall have mitred overlapping joints. They shall be delivered to the job in cartons, with the necessary screws, ready for attaching to the casements at the time of erection.

STANWIN CASEMENTS

STANDARD HARDWARE



SCREENED CASEMENT
OPERATOR NO. 1475

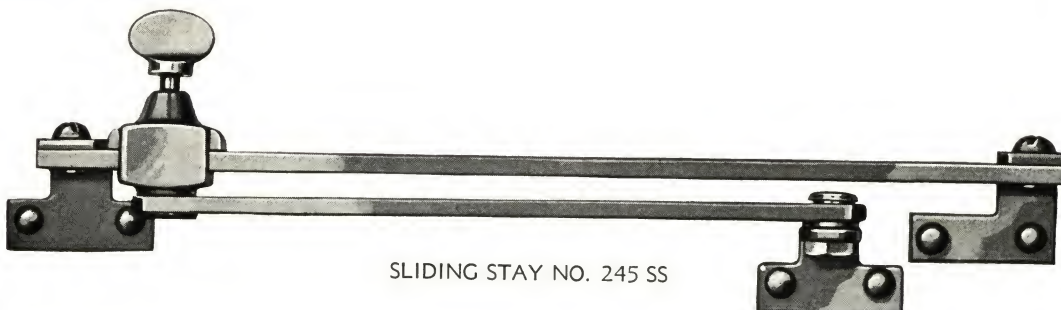


SCREENED CASEMENT
HANDLE NO. 1470

Handle No. 1377 is standard for Stanwin Casements; Sliding Stay No. 245 SS is furnished when friction hinges are not used. These are furnished in malleable iron with bronze working parts. Handle No. 1470 and Operator No. 1475 are standard for Stanwin Screened Casements. These are die cast with dull black finish. All hardware may be furnished in bronze at an extra cost.



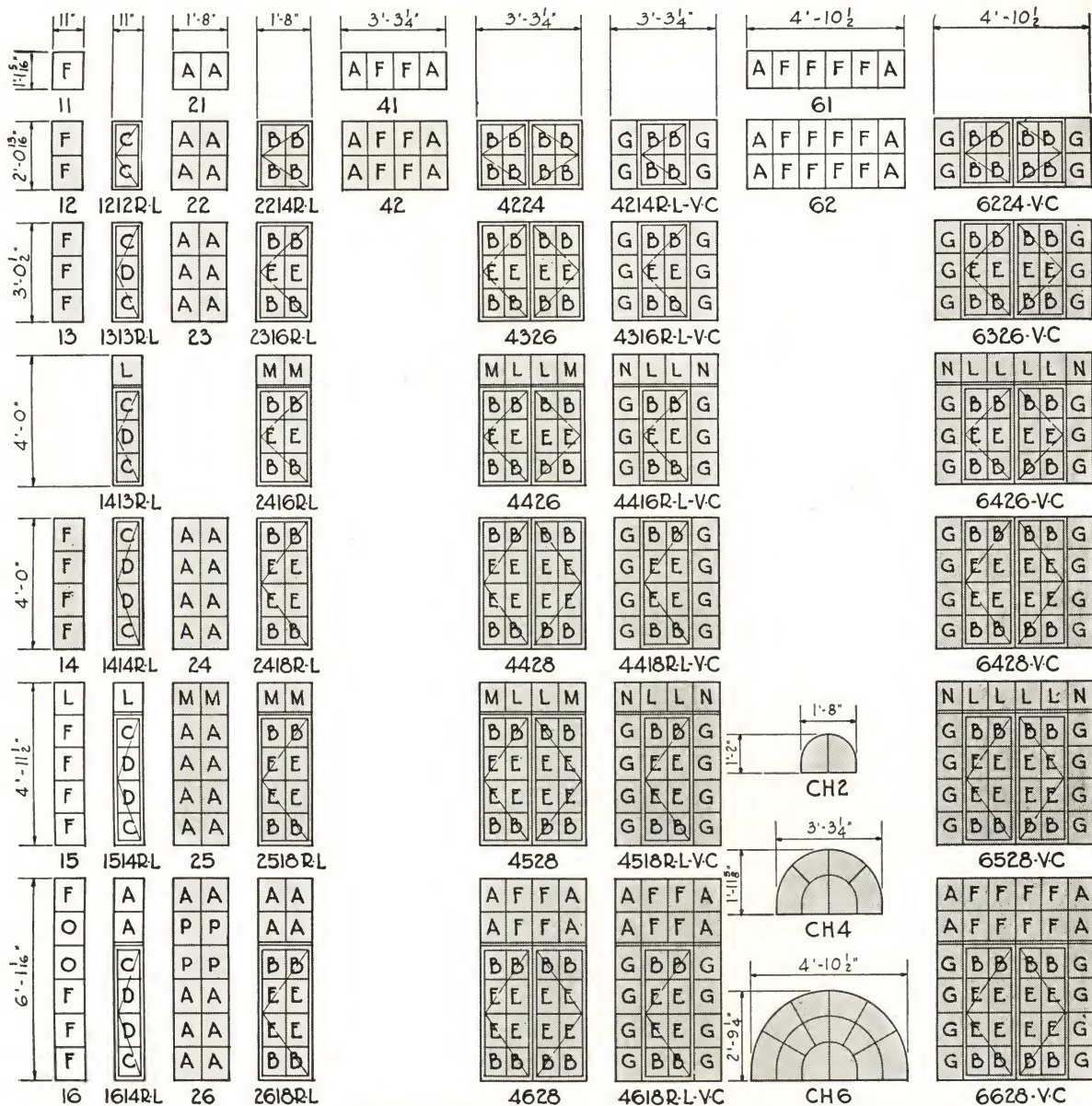
HANDLE
NO. 1377



SLIDING STAY NO. 245 SS

STANWIN CASEMENTS

STANDARD TYPES AND SIZES



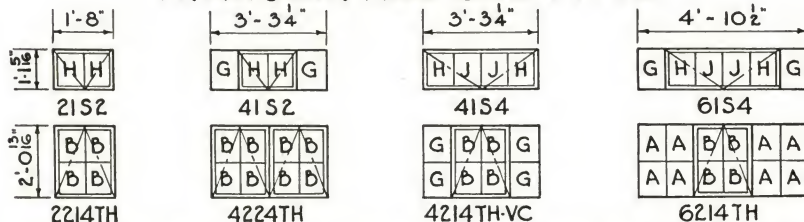
GLASS SIZES

A - 9 $\frac{1}{16}$ x 11 $\frac{3}{8}$	H - 8 $\frac{1}{16}$ x 10 $\frac{1}{2}$
B - 8 $\frac{1}{16}$ x 10 $\frac{13}{16}$	J - 9 $\frac{3}{8}$ x 10 $\frac{1}{2}$
C - 8 $\frac{1}{16}$ x 10 $\frac{1}{16}$	K - 8 $\frac{1}{16}$ x 10 $\frac{1}{16}$
D - 8 $\frac{3}{16}$ x 11 $\frac{3}{8}$	L - 9 $\frac{3}{8}$ x 10 $\frac{13}{16}$
E - 8 $\frac{7}{16}$ x 11 $\frac{3}{8}$	M - 9 $\frac{1}{16}$ x 10 $\frac{13}{16}$
F - 9 $\frac{3}{8}$ x 11 $\frac{3}{8}$	N - 8 $\frac{3}{4}$ x 10 $\frac{1}{2}$
G - 8 $\frac{3}{4}$ x 11 $\frac{3}{8}$	O - 9 $\frac{3}{8}$ x 12 $\frac{3}{16}$
P - 9 $\frac{1}{16}$ x 12 $\frac{3}{16}$	

CIRCULAR TYPES-SEE TEMPLATES
ALL TYPES MAY BE FURNISHED
WITHOUT MUNTINS WHEN REQUIRED.

NOTE: ALL SIDE HINGED SASH MAY BE FURNISHED EITHER RIGHT OR LEFT HAND HANDING OF A CASEMENT IS DETERMINED BY HINGE LOCATION VIEWED FROM OUTSIDE

TRANSOM AND SILL TYPES

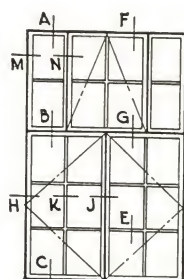


TYPES SHOWN SHADED
ARE CARRIED IN STOCK

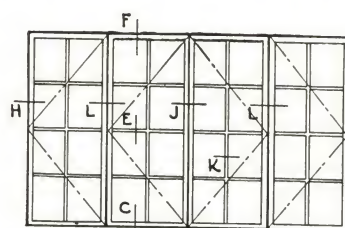
CERTAIN TYPES CAN BE SUPPLIED INWARD OPENING
FOR FURTHER INFORMATION INQUIRE FACTORY

STANWIN CASEMENTS

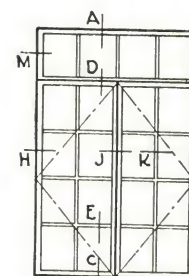
FULL SIZE SECTIONS



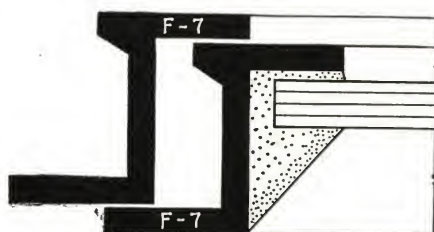
4214 THVC
4326



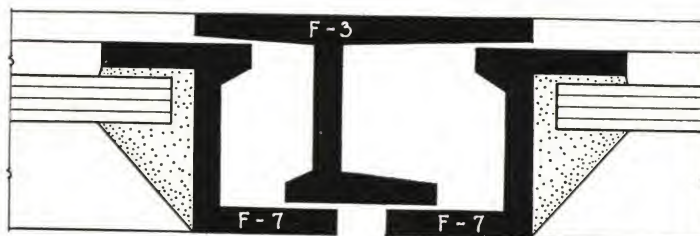
2416-L 4428 2416-R



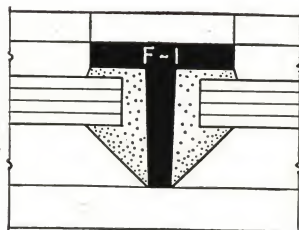
4528



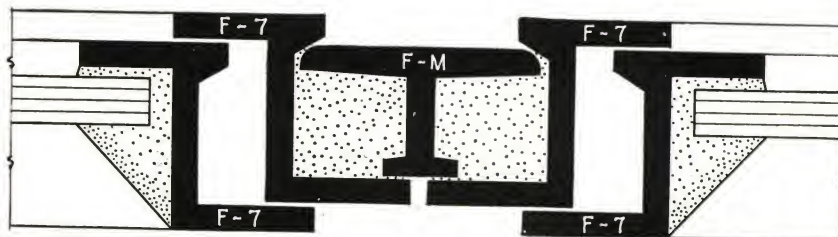
JAMB (H)



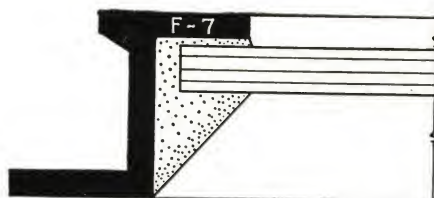
MEETING RAIL (J)



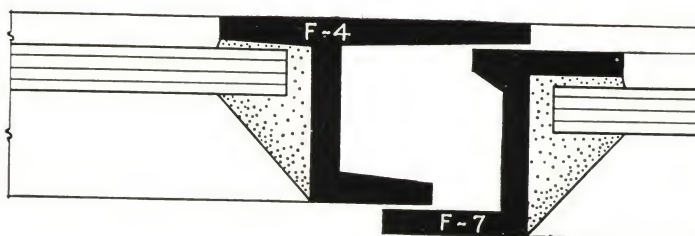
MUNTIN (K)



MULLION (L)



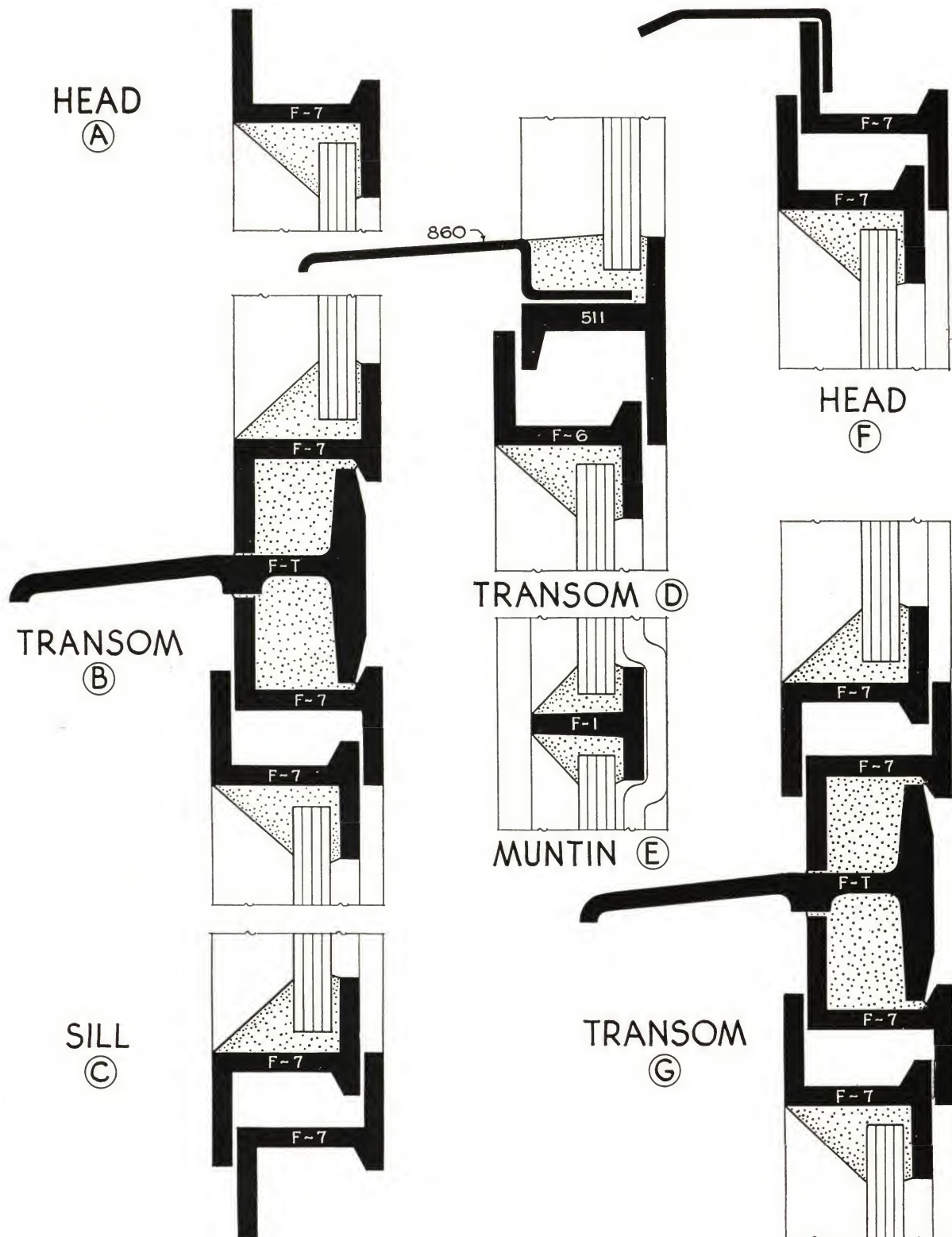
JAMB (M)



MEETING RAIL (N)

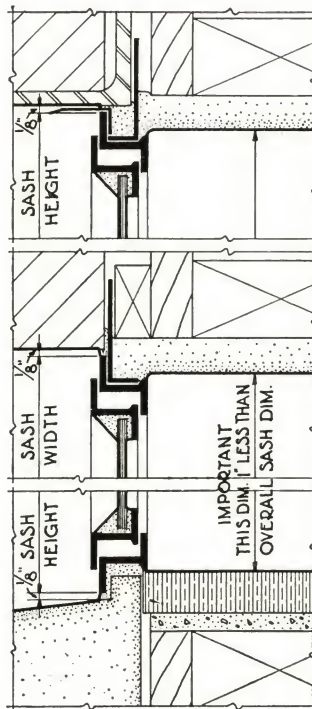
STANWIN CASEMENTS

FULL SIZE SECTIONS

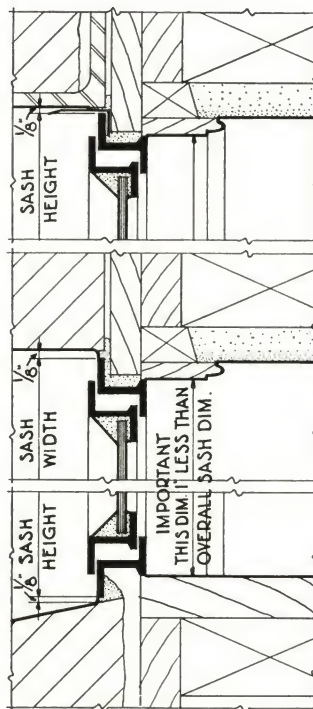


STANWIN CASEMENTS

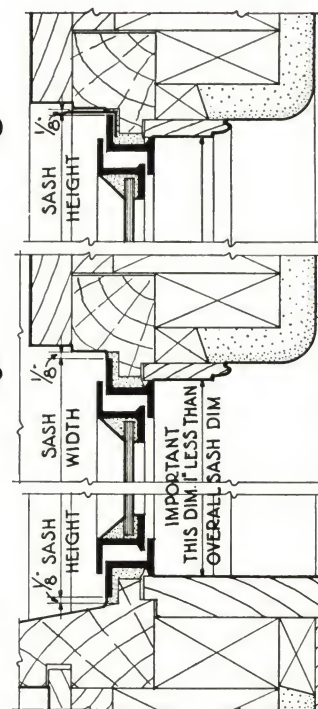
INSTALLATION DETAILS



BRICK VENEER

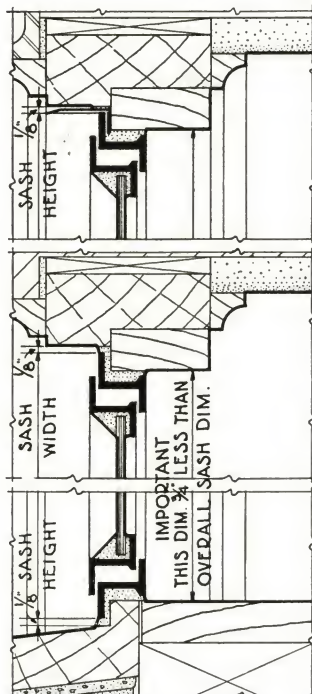


BRICK VENEER

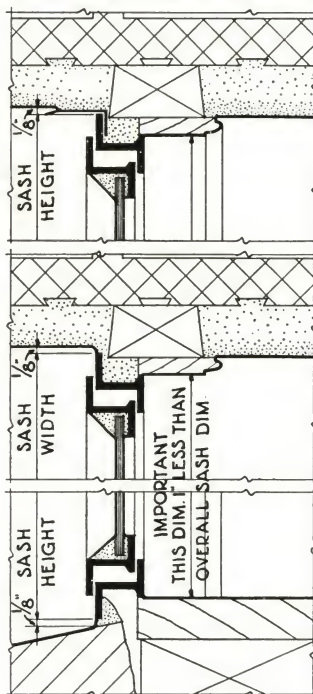


FRAME

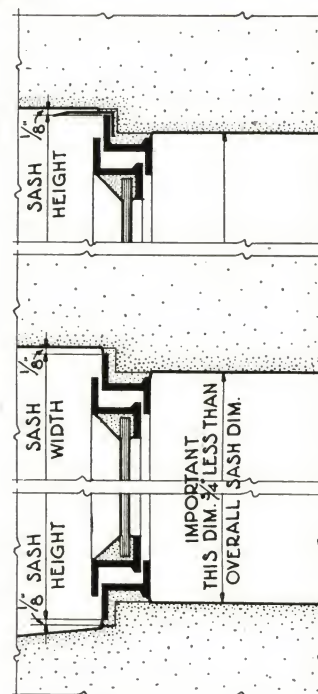
NOTE-WHEN CRITTALL SCREENS ARE USED, INTERIOR HEADS, JAMBS AND SILLS MUST BE KEPT CLEAR OF SASH FRAME AS SHOWN.



SOLID BRICK



TILE & STUCCO

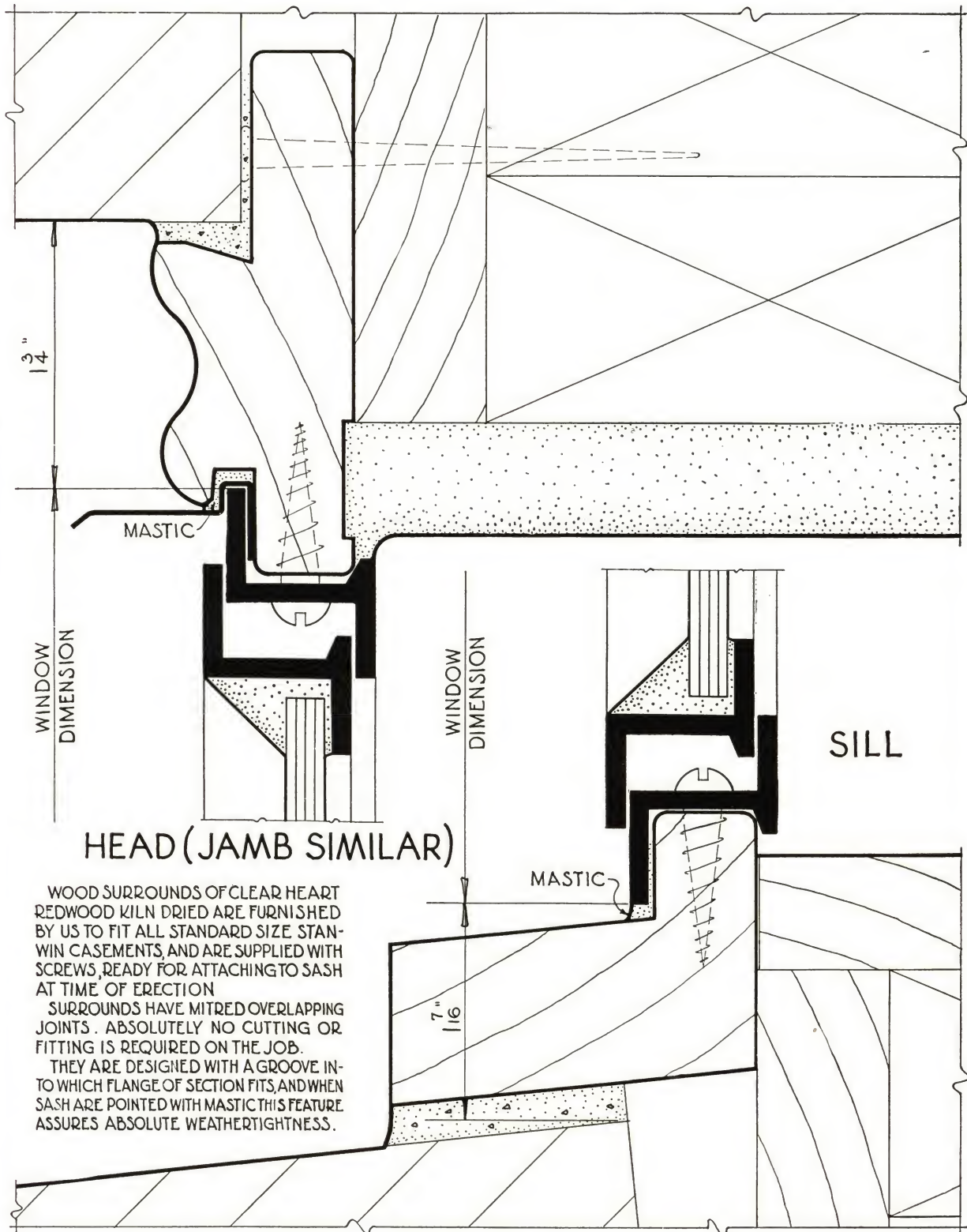


STONE

SCALE OF DETAILS - 3\"/>

STANWIN CASEMENTS

FULL SIZE DETAILS OF WOOD SURROUND



WOOD SURROUNDS OF CLEAR HEART REDWOOD KILN DRIED ARE FURNISHED BY US TO FIT ALL STANDARD SIZE STANWIN CASEMENTS, AND ARE SUPPLIED WITH SCREWS, READY FOR ATTACHING TO SASH AT TIME OF ERECTION

SURROUNDS HAVE MITRED OVERLAPPING JOINTS. ABSOLUTELY NO CUTTING OR FITTING IS REQUIRED ON THE JOB.

THEY ARE DESIGNED WITH A GROOVE IN-TO WHICH FLANGE OF SECTION FITS, AND WHEN SASH ARE POINTED WITH MASTIC THIS FEATURE ASSURES ABSOLUTE WEATHERTIGHTNESS.

STANWIN SCREENED CASEMENTS

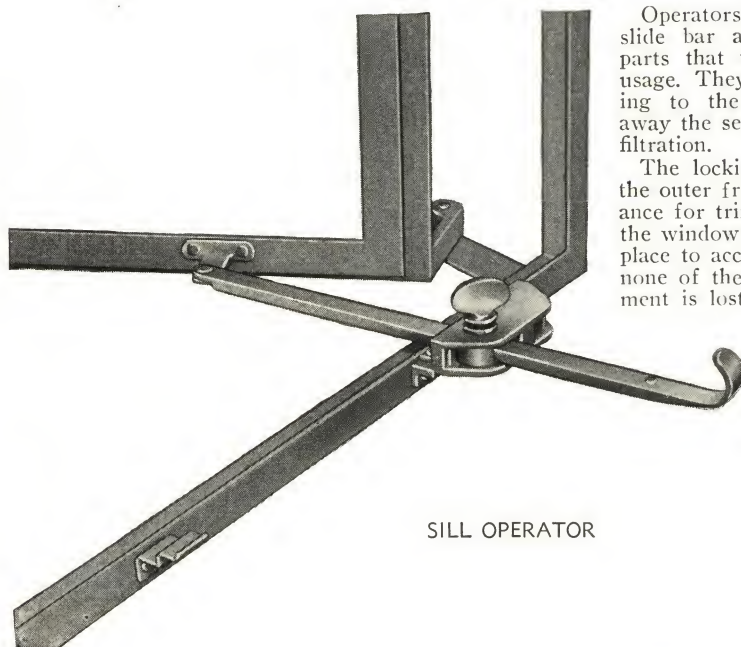


THE Stanwin Screened Casement is the result of careful study and experimentation, directed toward producing a compact unit, combining beauty and utility. The screen is available in either steel or bronze with antique bronze cloth. The rigid frame lies perfectly flat against the casement and, having a beveled return to the screen cloth, does not provide a ledge for dust. It is held securely on the casement by the hardware brackets at the bottom, and by two clips near the top. Complete operation of the casement—opening, closing, and locking—is accomplished without moving the screen. For cleaning windows or storage purposes, the screen is quickly removed and readily replaced.

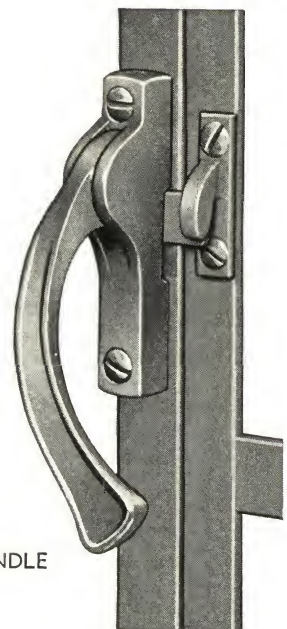
The very simplicity that gives easy operation contributes to the attractiveness of the fittings, which were created to conform with the generally accepted design of casement hardware. The fitting at the sill not only serves to operate the window but also holds it open in any desired position by thumb screw adjustment; and, in addition, by engaging it in the bracket rest when the window is closed, the casement is effectually locked. A handle of pleasing appearance, engaging in a beveled strike plate, pulls the sections snugly together, insuring perfect wind and weather tightness.

Operators are die cast with bronze slide bar and have no mechanical parts that will loosen with normal usage. They are designed for attaching to the frame without cutting away the sections and risking air infiltration.

The locking handle is attached to the outer frame with sufficient clearance for trim and plaster. Note that the window sections are not cut any place to accommodate the handle, so none of the weathering of the casement is lost.



SILL OPERATOR



HANDLE

**PRODUCTS
OF
CRITTALL**



UNIVERSAL CASEMENTS

Custom-built casements and doors of solid steel or bronze to meet the architects' sizes, designs, and most exacting specifications.



NORMAN CASEMENTS

Economical, heavy, standardized casements and doors of excellent quality for better class projects.



STANWIN CASEMENTS

Standard lightweight casements and doors stocked in warehouses for convenient distribution.

